# HILLSBOROUGH COUNTY

# Florida

Office of the County Administrator
Daniel A. Kleman

BOARD OF COUNTY COMMISSIONERS

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January 17, 1996

Mr. Kim Ford, P.E.
Solid Waste Permitting
Florida Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

JAN 23 1996 SOUTHWEST DISTHIGH

RE: Southeast County Landfill - Leachate Management

Dear Mr. Ford:

The Hillsborough County Department of Solid Waste (DSW) is providing the final construction report prepared by Law Engineering for the November 21, 1995 construction of the pump control well/settlement plate in Phase IV. The report also includes the drilling information from the July 5, 1995 construction of the Phase IV piezometer.

This information is being provided to the Florida Department of Environmental Protection (DEP) and the Hillsborough County Environmental Protection Commission as a supplement to the information provided in the DSW's January 10, 1996 correspondence.

Please advise should you have any questions or require additional information at this time.

Sincerely

Patricia V. Berry

Landfill Services Section Manager

Department of Solid Waste

Attachment

xc: Matt Matthews, DSW Larry Ruiz, SCS Steve Morgan, DEP Paul Schipfer, EPC



January 11, 1996

Mr. David S. Adams
Hillsborough County
Department of Solid Waste
P.O. Box 1110
Tampa, Florida 33601

Subject:

Report of Drilling Services SOUTHEAST LANDFILL Hillsborough County, Florida LAW Project No. 40121-5-6946

Dear Mr. Adams:

Law Engineering and Environmental Services, Inc. (LAW) is pleased to submit our report of drilling services for the above-referenced project. Our services were performed in general accordance with our Revised Cost Estimate No. 40121-5-6946 dated November 9, 1995. Our services were authorized by Hillsborough County Work Order No. TI-03-95-1056. This report presents a review of the project information and a summary of our field services. The Appendix contains a site location map, a field location plan, test boring records, and piezometer details.

**Project Information** 

The purpose of our drilling services was to install two piezometers at the Southeast Landfill (SELF), Hillsborough County, Florida. The piezometers were designed by SCS Engineers, Inc. to monitor leachate levels in the sand drainage layer. The SELF is located 8.8 miles east of U.S. Highway 301 off County Road 672.

Field Services

Field services were performed by LAW representatives on July 5, 1995 and November 21, 1995. Present at the site during our field services were Mr. David Adams of Hillsborough County and Mr. Larry Ruiz of SCS Engineers, Inc. On July 5, 1995, Piezometer No. 1 was installed in alternate location "ALT-2"

after the original piezometer location was aborted. The original piezometer location was aborted because the clay confining layer was penetrated during drilling operations and the top of clay could not be accurately defined. On November 21, 1995, Piezometer No. 2 was installed. This piezometer is intended to be utilized as a pump control well. The piezometer locations are noted on the Field Location Plan in the Appendix.

The installation of the two piezometers is summarized as follows:

### PIEZOMETER No. 1

# 1) Drilling Operations

- A 10-inch nominal diameter borehole was augered through the waste layer to a depth of approximately 19.5 feet below land surface (bls).
- Continuous split spoon sampling was performed through the sand drainage layer located from 19.5 to 22.5 feet bls.
- Boring 1 was terminated at 22.5 feet bls where the clay confining layer was encountered.
- David Adams classified the drill cuttings in the field and provided soil descriptions and depths to LAW. The soils encountered are shown on the Test Boring Records in the Appendix.

### 2) Piezometer Installation

- Once the boring was terminated, a 4-inch diameter piezometer was installed in the borehole. The piezometer consisted of Schedule 80 PVC pipe and slotted screen, a bottom end cap, and lockable top end cap. The top of the piezometer extended approximately 3 feet above the ground surface.
- The annulus between the PVC and the borehole wall was filled with several different materials. The materials and depth used to fill each piezometer annulus are included in Table 1.

### PIEZOMETER No. 2

### 1) Drilling Operations

- A 10-inch nominal diameter borehole was augered through the waste layer to a depth of approximately 19.5 feet below land surface (bls).
- Continuous split spoon sampling was performed through the sand drainage layer located from 19.5 to 22.5 feet bls. Split sampling continued 6-inches into the clay confining layer in Boring 2 for a total depth of 23 feet.

- Boring 1 was terminated at 22.5 feet bls where the clay confining layer was encountered. At the request of Larry Ruiz, Boring 2 was terminated at 23 feet bls, 6-inches into the clay confining layer. This was done so that the screen slots would be located at or slightly above the top of the clay confining layer.
- David Adams classified the drill cuttings in the field and provided soil descriptions and depths to LAW. The soils encountered are shown on the Test Boring Records in the Appendix.

### 2) Piezometer Installation

- Once the boring was terminated, a 4-inch diameter piezometer was installed in the borehole. The piezometer consisted of Schedule 80 PVC pipe and slotted screen, a bottom end cap, and lockable top end cap. The top of the piezometer extended approximately 3 feet above the ground surface.
- The annulus between the PVC and the borehole wall was filled with several different materials. The materials and depth used to fill each piezometer annulus are included in Table 1.

Table 1

Piezometer Number	Material	Depth Range (Feet bls)
1	Clayey Sand	0.0 - 1.5
	Bentonite	1.5 - 17.5
	60/145 Sand	17.5 - 19.5
	20/30 Sand	19.5 - 22.5
2	Clayey Sand	0.0 - 1.5
	Bentonite	1.5 - 17.5
	60/145 Sand	17.5 - 19.5
	Pea Gravel	19.5 - 23.0

Illustrations of both piezometers are located in the Appendix.

# Closing

We appreciate the opportunity to provide these services. If you have any questions or comments regarding this report, please contact our Tampa office.

Sincerely,

LAW ENGINEERING AND ENVIRONMENTAL SERVICES, INC.

Patrick T. Trimport

Project Manager

Curtis J. Roos, P.E. Principal Engineer

Florida Registration No. 27570

PTT/CJR/j1:56946.RPT

Distribution:

(2) Addressee

Appendix:

Site Location Map (Figure 1)

Field Location Plan (Figure 2) Test Boring Records

Piezometer No. 1 Detail (Figure 3) Piezometer No. 2 Detail (Figure 4)

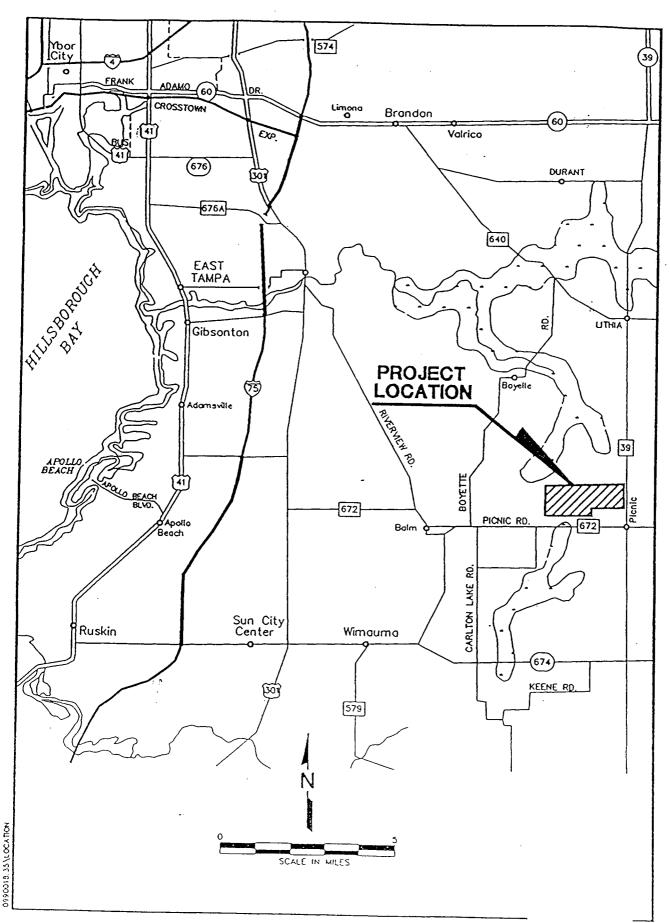


Figure 1 SITE LOCATION MAP LAW No. 40121-5-6946

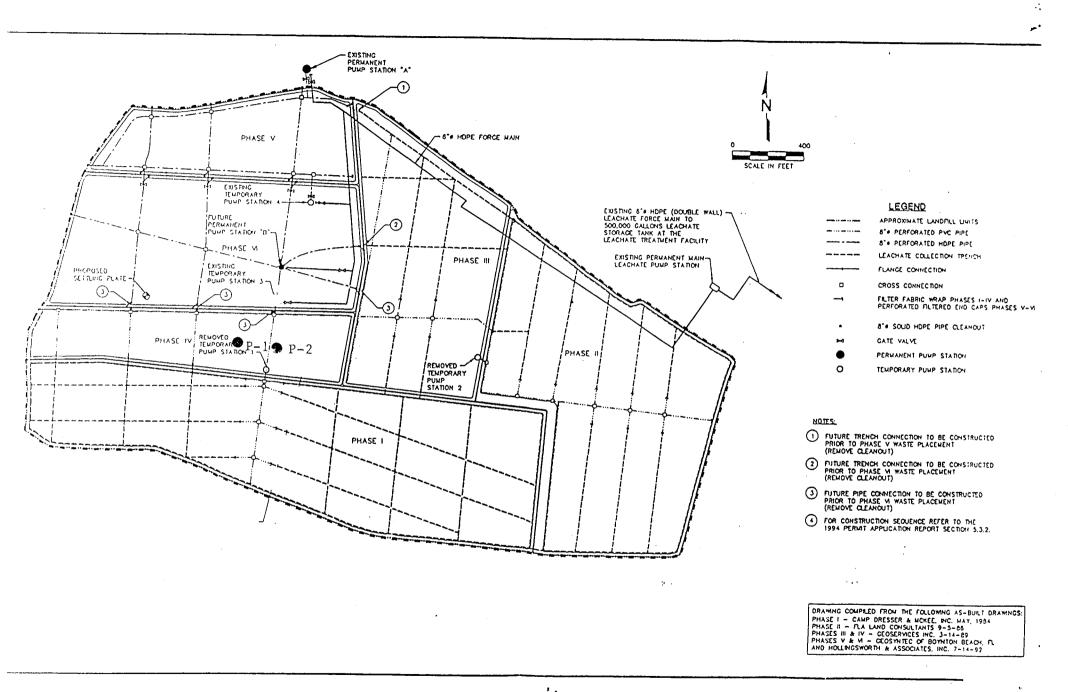
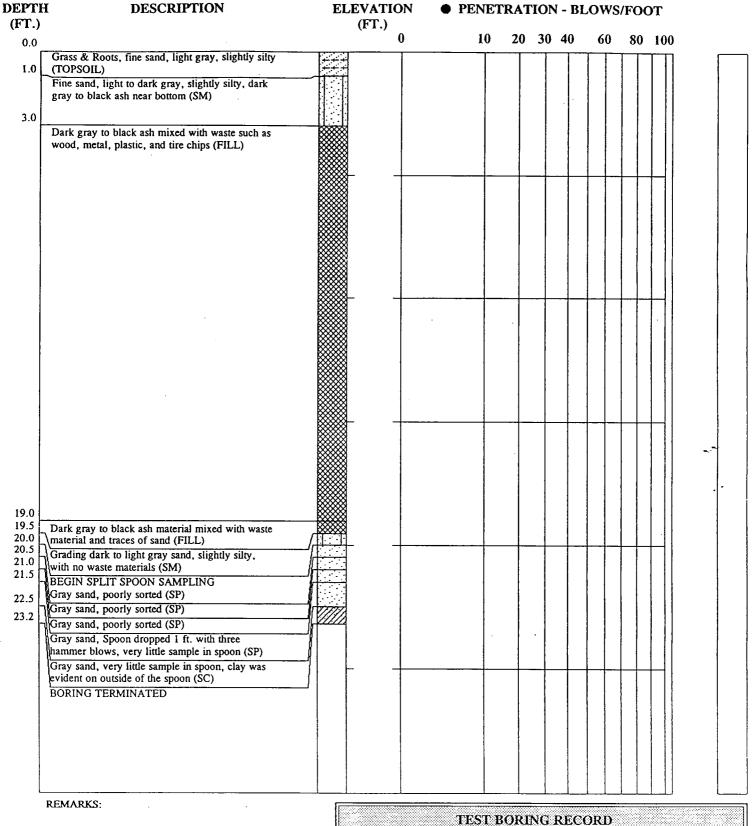


Figure 2 FIELD LOCATION PLAN LAW No. 40121-5-6946



SEE KEY SHEET FOR EXPLANATION OF SYMBOLS AND ABBREVIATIONS USED ABOVE

#### ILSI BOIGING RECORD

P1-ALT1

July 5, 1995

BORING NUMBER
DATE DRILLED
PROJECT NUMBER
PROJECT

40121-5-6946

PAGE 1 OF 1

Southeast Landfill



REMARKS:

## TEST BORING RECORD

BORING NUMBER

P1-ALT2 July 5, 1995

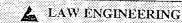
DATE DRILLED PROJECT NUMBER

40121-5-6946

PROJECT

Southeast Landfill

PAGE 1 OF 1



**DEPTH** DESCRIPTION **ELEVATION** • PENETRATION - BLOWS/FOOT (FT.) (FT.) 0.0 10 20 30 40 60 80 100 Grass & Roots, fine sand, light grey, slightly silty (TOPSOIL) 1.0 Fine sand, light to dark gray slightly silty, dark gray to black ash near bottom (SM) 3.0 Dark gray to black ash mixed with waste such as wood, metal, plastic, some sand (FILL) 19.0 19.5 Dark gray ash with traces of gray sand (FILL) BEGIN SPLIT SPOON SAMPLING Wood chips from above gray sand, poorly sorted (FILL) 21.5 22.0 Gray sand, poorly sorted (SP) 22.5 Gray sand, no clay evident on shoe of spoon (SP) 23.0 Light gray clay, cohesive, plastic (SC) BORING TERMINATED REMARKS:

SEE KEY SHEET FOR EXPLANATION OF SYMBOLS AND ABBREVIATIONS USED ABOVE

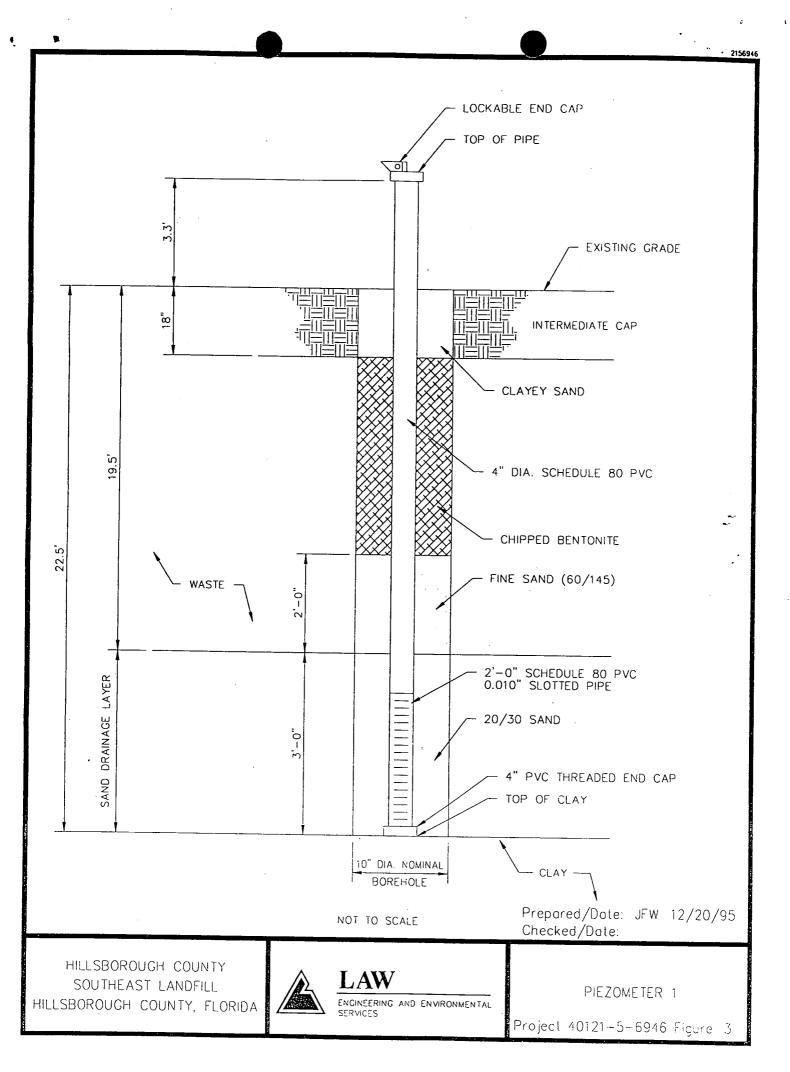
### TEST BORING RECORD

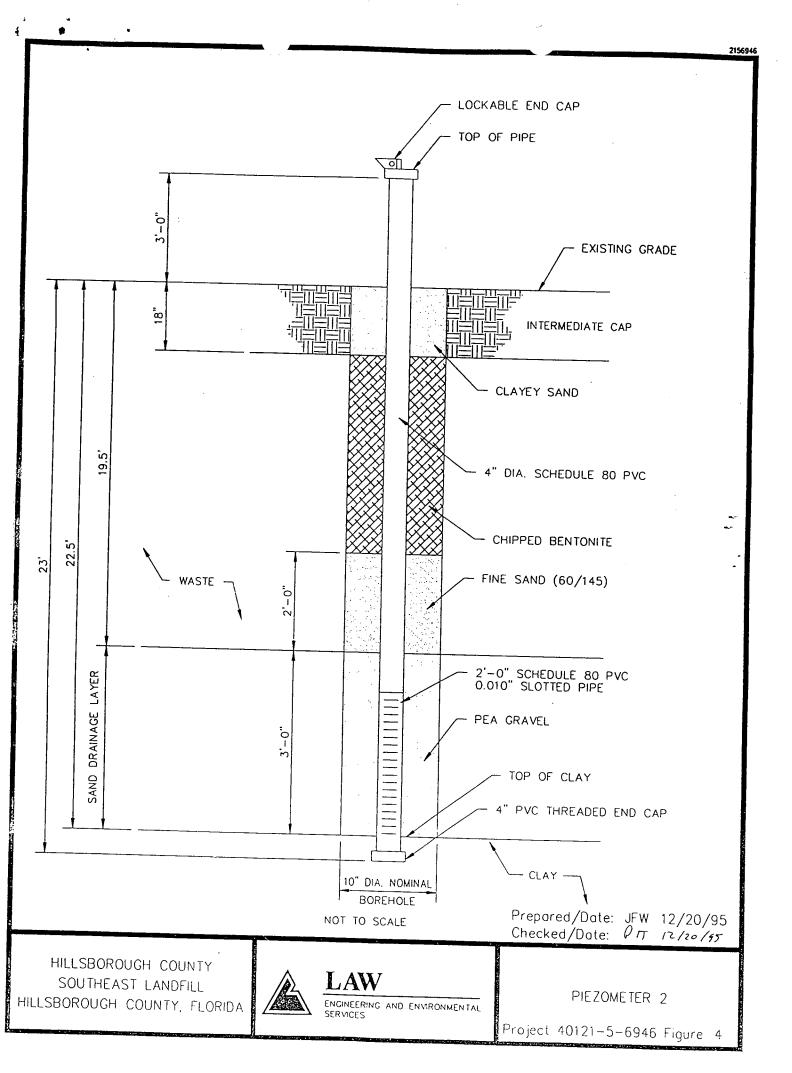
BORING NUMBER DATE DRILLED PROJECT NUMBER P-2 - Pump Control Well

November 21, 1995 40121-5-6946

**PROJECT** Southeast Landfill PAGE 1 OF 1

LAW ENGINEERING





# HILLSBOROUGH COUNTY

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JAN 17 1996

OCCIHWEST DISTRICT

January 10, 1996

Mr. Kim Ford, P.E.
Solid Waste Permitting
Florida Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

RE: Southeast County Landfill - Leachate Management

Dear Mr. Ford:

In accordance with the Hillsborough County Department of Solid Waste's (DSW) Leachate Management Plan for the Southeast County Landfill (Landfill), the DSW is providing the Landfill's Water Balance Report Form for the month of December 1995. In addition, the DSW is providing the December 1995 field data forms for the Landfill, the daily leachate and collection system evaluation reports, and the Year-to-Date Leachate Balance Summary. In addition, the DSW is providing the leachate level readings at the recently constructed pump control well.

The DSW is has received and reviewed the draft construction report prepared by Law Engineering for the November 21, 1995 construction of the pump control well/settlement plate in Phase IV. The report also includes the drilling information from the July 5, 1995 construction of the Phase IV piezometer. The DSW has returned the report to Law for finalization and will forward a copy of the final report to the Department of Environmental Protection (DEP) once it is received. The DSW is also providing the as-built drawing and location map for the Phase VI settlement plate construction which was completed on December 7, 1995.

This information is being provided to the Florida Department of Environmental Protection (DEP) and the Hillsborough County Environmental Protection Commission as an update on the DSW's leachate management efforts for the Landfill. This information is being provided in response to both the permitting and enforcement issues at hand.

Mr. Kim Ford January 10, 1996 Page Two

Please advise should you have any questions or require additional information at this time.

Sincerely,

Patricia V. Berry

Landfill Services Section Manager

Department of Solid Waste

## Attachments

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

#### **BEST AVAILABLE COPY**

#### LEACHATE WATER BALANCE REPORT FORM DECEMBER 1995

SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FLORIDA

1		II		111	IV	V	VI	VII	VIII	IX	X	XI	XII	XIII	XIV	XV	XVI	XVII	222111
					Depth in	Est. Depth	Est.	Pumped	Pumped	Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Total	XVIII
	l .	Area			Effluent	Over	Landfill	From	From	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir-	Effluent	Landfill
Day		acres)		Rainfall	Pond	Liner	Storage	Sta. No 3	Sta. No. 5	to LTRF	Tank	at LTRF	Hauled	culation	Storage	Sprayed	culation	Hauled	Evapor.
Day	final a		int. 92.2	(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)
2	23.2		92.2	0.0	29.0 27.0	56.5	8,953,000	0	91,900	91,900	317,000	60,000	37,170	0	92,000	42,900	0		35,000
3	23.2		92.2			56.3	8,837,000	2,000	82,200	84,200	302,000	60,000	0	0	85,000	42,900	0	56,000	35,000
4	23.2		92.2	0.0	NR	NR	NR	2,000	82,200	84,200	NR	60,000	0	0	NR	0	0	0	0
5	23.2		92.2	0.0	28.0 25.0	56.0	8,721,000	3,020	88,980	92,000	331,000	60,000	54,393	0	88,000	42,900	8,500	37,000	42,000
6	23.2		92.2			55.0	8,258,000	0	89,400	89,400	317,000	60,630	43,484	0	78,000	42,900	8,500	31,000	42,000
7	23.2		92.2	0.0	30.0	55.8	8,606,000	0	82,200	82,200	288,000	60,100	66,164	0	95,000	42,900	8,500	12,000	42,000
8	23.2		92.2	0.0	25.0	56.0	8,721,000	0	85,900	85,900	230,000	60,290	49,613	0	78,000	0	0	12,000	0
9	23.2		92.2		29.0	55.0	8,258,000	0	88,500	88,500	245,000	60,230	16,500	0	92,000	30,450	17,000	62,000	38,000
10	23.2		92.2	0.0	29.0	55.0	8,258,000	0	82,400	82,400	230,000	60,620	0	0	92,000	0	17,000	62,000	14,000
11	23.2		92.2		NR	NR	NR	0	82,400	82,400	NR	60,000	0	0	NR	0	0	0	0
12	23.2			0.0	44.0	53.0	7,331,000	0	82,600	82,600	259,000	60,340	37,569	0	146,000	42,900	0	43,000	35,000
13	23.2		92.2	0.0	36.0	53.0	7,331,000	0	84,500	84,500	230,000	60,200	37,174	0	116,000	10,525	17,000	25,000	22,000
14			92.2	0.0	31.0	54.0	7,794,000	0	70,800	70,800	230,000	60,250	12,554	0	99,000	0	17,000	0	14,00
	23.2		92.2	0.0	31.0	53.5	7,562,000	0	95,900	95,900	230,000	60,250	0	0	99,000	0	26,000	0	21,00
15 16	23.2		92.2	0.0	27.0	54.0	7,794,000	0	86,200	86,200	259,000	60,250	18,904	0	85,000	0	8,500	62,000	7,000
			92.2	0.0	27.0	54.8	8,142,000	0	86,050	86,050	259,000	60,300	0	0	85,000	0	8,500	62,000	7,000
17	23.2		92.2	0.0	NR	NR	NR	0	86,050	86,050	NR	60,050	0	0	NR	0	0	0	0,000
18	23.2		92.2	0.0	42.0	54.8	8,142,000	0	90,300	90,300	302,000	60,150	11,500	0	138,000	12,000	0	62,000	10,000
19	23.2		92.2	0.0	42.0	55.5	8,490,000	0	94,900	94,900	302,000	60,100	12,415	0	138,000	20,210	0	50,000	16,000
20	23.2		92.2	0.0	42.0	55.3	8,374,000	0	80,500	80,500	317,000	60,250	41,002	0	138,000	30,580	8,500	37,000	32,000
21	23.2		92.2	0.0	41.0	53.8	7,678,000	0	81,400	81,400	288,000	60,250	12,336	0	135,000	30,000	1,700	49,000	26,000
22	23.2		92.2	0.0	38.0	54.0	7,794,000	0	84,900	84,900	288,000	60,110	25,032	0	124,000	30,000	0	37,000	24,000
23	23.2		92.2	0.0	41.0	54.0	7,794,000	0	54,750	54,750	259,000	60,310	0	0	135,000	30,000	1,700	62,000	26,000
24	23.2		92.2	0.0	NR	NR	NR	810	53,940	54,750	NR	60,080	0	0	NR	30,000	0	62,000	24,000
25	23.2		92.2	0.0	NR	NR	NR	810	108,690	109,500	NR	60,220	0	0	NR	30,000	0	0	24,000
26	23.2		92.2	0.0	40.0	53.0	7,331,000	0	82,100	82,100	302,000	60,180	24,824	0	131,000	30,020	8,500	37,000	31,000
27	23.2		92.2	0.0	39.0	53.3	7,447,000	0	31,900	31,900	288,000	60,200	24,839	0	127,000	30,000	8,500	37,000	31,000
28	23.2		92.2	0.0	41.0	52.5	7,099,000	0	100,400	100,400	230,000	60,160	0	0	135,000	45,000	0	37,000	36,000
29	23.2		92.2	0.0	40.0	51.5	6,635,000	0	78,400	78,400	245,000	60,190	0	0	131,000	45,000	8,500	37,000	43,000
30	23.2		92.2	0.0	36.0	52.0	6,867,000	0	85,667	85,667	288,000	60,350	0	0	116,000	0	0	68,000	43,000
31	23.2	5.0	92.2	0.5	NR	NR	NR	0	85,667	85,667	NR	60,040	0	0	NR	0	0	62,000	0
T-1-1																		02,000	
Total				0.50	860.0	1357.3	198,217,000	8,640	2,561,693	2,570,333	6,836,000	1,866,100	525,473	0	2,778,000	661,185	173,900	1,113,000	677,000
Average				0.02	34.4	54.3	7,929,000	2,000	83,000	83,000	221,000	60,000	31,000	0	111,000	33,000	11,000	45,000	27,000
Notes:															f:\project\0995029.				27,000

- 1. NR = No Records.
- 2. Column II, total area with waste is 120.4 acres (Phases I-IV).
- 3. Columns III and IV, field measured. Column III, Trace is less than 0.01 inches and is not included in total.
- 4. Column V, estimated from depth in Phase IV Piezometer.
- 5. Column VI, estimated from Column V and approximate volume with top of clay elevation at 117.0 feet.
- 6. Column VII calculated based on average 180 gpm and hour conversion.
- 7. Column VIII calculated by subtracting VII from flow meter reading.
- 8. Column IX, quantity from flow meter.
- 9. Column X, calculated from depth in 500,000 gal. leachate tank.
- 10. Columns XI and XV, quantities from flow meters.
- 11. Columns XII, XIII, XVI, and XVII, quantities calculated from truck weight.12. Column XVIII, 80.8% of the daily values from Columns XIII, XV and XVI.
- 13. Values in italic are substitute for missing data and are based on averaged values.

#### FIELD DATA ENTRY FORM DECEMBER 1995

### SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FLORIDA

	<u>ll</u>	111	IV	V	VI	VII	VIII	IX	X	XI	XII	XIII	XIV	XV_	XVI	XVII	XVIII	XIX
į	<b> </b>																Pumped to	
	Active	Depth in	Stormwater	Phase III	Phase IV	Phase IV		Leachate		Leachate	Effluent		Effluent	Leachate	Effluent	Depth in	LTRF	Sta. No. 3
_	Area	1	In Sump No. 4	Riser	Riser	Piezometer	Rainfall	Contractor	County	Recirc.	Contractor	County	Recirc.	Treated at	Sprayed	500K Tank	Reading	Reading
Day	(ac.)	(in.)	(in.)	(in.)	(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	LTRF (gal.)	(gal.)	(ft.)	(gal.)	(hours)
1	5.0	29.0	71.0	3.5	13.0	56.5	0.0	18,230	18,940	0	12,200	0	0	60,000	42,900	11.0	2,533,000	3,100.77
2	5.0	27.0	71.0	4.0	13.5	56.3	0.0	0	0	0	55,654	0	0	60,000	42,900	10.5	2,624,900	3,100.77
3	5.0	NR	NR	NR	NR	NR	0.0	0	0	0	0	0	0	60,000		NR	2,709,100	3,100.96
4	5.0	28.0	70.0	4.0	16.0	56.0	0.0	37,393	17,000	0	36,887	0	8,500	60,000	42,900	11.5	2,793,300	3,101.14
5	5.0	25.0	70.0	9.0	15.0	55.0	0.0	43,484	0	0	30,887	0	8,500	60,630	42,900	11.0	2,885,300	3,101.42
6	5.0	30.0	70.0	3.5	12.3	55.8	0.0	49,664	16,500	0	12,300	0	8,500	60,100	42,900	10.0	2,974,700	3,101.42
7	5.0	25.0	NR	3.0	12.0	56.0	0.0	49,613	0	Ó	12,300	0	0	60,290	0	8.0	3,056,900	3,101.42
8	5.0	29.0	NR	3.5	12.0	55.0	0.0	0	16,500	0	61,670	. 0	17,000	60,230	30,450	8.5	3,142,800	3,101.42
9	5.0	29.0	NR	3.5	12.0	55.0	0.0	0	0	0	61,982	0	17,000	60,620	Ō	8.0	3,231,300	3,101.4
10	5.0	NR	NR	NR	NR	NR	0.0	0	0	0	0	0	0	60,000	0	NR	3,313,700	3,101.42
11	5.0	44.0	NR	4.0	12.0	53.0	0.0	18,577	18,992	0	43,236	0	0	60,340	42,900	9.0	3,396,100	3,101.42
12	5.0	36.0	NR	4.0	12.0	53.0	0.0	37,174	0	O	24,661	0	17,000	60,200	10,525	8.0	3,478,700	3,101.42
13	5.0	31.0	NR	3.5	12.0	54.0	0.0	0	12,554	0	0	0	17,000	60,250	0	8.0	3,563,200	3,101.42
14	5.0	31.0	NR	3.5	15.5	53.5	0.0	0	0	Ó	0	0	26,000	60,250	0	8.0	3,634,000	3,101.42
15	5.0	27.0	NR	3.5	12.0	54.0	0.0	0	18,904	Ö	61,782	0	8,500	60,250	0	9.0	3,729,900	3,101.42
16	5.0	27.0	NR	3.0	12.3	54.8	0.0	0	0	0	61,970	0	8,500	60,300	0	9.0	3,816,100	3,101.42
17	5.0	NR	NR	NR	NR	NR	0.0	0	0	0	0	0	0	60,050	0	NR	3,902,150	3,101.42
18	5.0	42.0	NR	3.8	12.3	54.8	0.0	0	11,500	0	62,043	0	0	60,150	12,000	10.5	3,988,200	3,101.42
19	5.0	42.0	NR	3.0	12.3	55.5	0.0	12,415	0	0	49,602	0	0	60,100	20,210	10.5	4,078,500	3,101.42
20	5.0	42.0	NR	3.0	12.0	55.3	0.0	24,902	16,100	0	36,974	0	8,500	60,250	30,580	11.0	4,173,400	3,101.42
21	5.0	41.0	NR	3.0	11.8	53.8	0.0	12,336	0	0	49,472	0	1,700	60,250	30,000	10.0	4,253,900	3,101.42
22	5.0	38.0	NR	3.0	12.0	54.0	0.0	25,032	ō	0	36,949	0	0	60,110	30,000	10.0	4,335,300	3,101.42
23	5.0	41.0	NR	3.0	12.0	54.0	0.0	0	0	0	62,146	0	1,700	60,310	30,000	9.0	4,420,200	3,101.42
24	5.0	NR	NR	NR	NR	. NR	0.0	0	0	0	61,500	0	0	60,080	30,000	NR	4,474,950	3,101.42
25	5.0	NR	NR	NR	NR	NR	0.0	0	0	0	0	0	. 0	60,220	30,000	NR	4,529,700	3,101.50
26	5.0	40.0	NR	2.8	12.0	53.0	0.0	24,824	0	0	37,025	0	8,500	60,180	30,020	10.5	4,639,200	3,101.57
27	5.0	39.0	NR	3.0	11.8	53.3	0.0	24,839	0	0	36,945	0	8,500	60,200	30,000	10.0	4,721,300	3,101.57
28	5.0	41.0	NR	3.0	21.3	52.5	0.0	0	Ō	0	37,268	0	0	60,160	45,000	8.0	4,753,200	3,101.57
29	5.0	40.0	NR	3.0	12.0	51.5	0.0	0	0	0	37,290	. 0	8,500	60,190	45,000	8.5	4,853,600	3,101.57
30	5.0	36.0	NR	3.0	12.0	52.0	0.0	0	. 0	0	67,600	0	0	60,350	0	10.0	4,932,000	3,101.57
31	5.0	NR	NR	NR	NR	NR	0.5	0	0	0	61,500	0	0	60,040	0	NR	5,017,667	3,101.57
Notes:															f:\project\03	995029.11\le	achate\12-95ba	l.wb2 ,

#### Notes:

- 1. NR = No Records.
- 2. Columns II-VIII, field measured. Column VIII, Trace is less than 0.01 inches.
- 3. Column VI, if level exceeds 24 inches, leachate withdrawal from landfill must increase.
- 4. Column VII, Phase IV piezometer began monitoring on 7/10/95.
- 5. Columns IX-XIV, quantities calculated from truck weight.
- 6. Columns XV and XVI, quantities from flow meters.
- 7. Column XVII, field measured.
- 8. Column XVIII, reading from flow meter.
- 9. Column XIX, Hour reading from TPS-3.
- 10. Values in italic are substitute for missing data and are based on averaged values.

# LEACHATE DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Year) Dec. 95

	Active Area	(1) Phase IV	1	Phase IV	Phase III	Station	Depth in	Storage	Leach	ate Hauled	Leachate	
Date		Piezometer	No. 3	Riser	Riser	No. 4	500K Tank	500K Tank	Contractor	County	Recirculation	Rainfa
Date	(acres)	(inches)	(inches)	(inches)	(inches)	(inches)	(feet)	(gallons)	(gallons)	(gallons)	(gallons)	(inches
1	··	56.5	_7_	13	3.5	71		330K	18,230	18,940	Ø	Ø
2	<del></del>	56.25	7	13.5	4	71	10.5	3151	0	Ø	Ø	Ø
3		NR	NR	NR	NR	NR	NR	NR	Ø	0	Ø	Ø
4		56	7	16	4	70	11.5	345K	37,393	17,000	Ø	Ø
5		55	_7_	15	9	70	//	330K	43 484	8	0	0
6		<i>55</i> .75	7	12.25	3.5	70	10	300K	49.664	16,500	Ø	e
7		56		12	3	NR	8	255 K	49,613	8	Ø	Ø
8		55	7	12	3.5	NR	8.5	240K	0	16,500	Ø	Ø
9		55	7	12	3.5	NR	8	255K	0	0	Ø	Ø
10		NR	NR	NR	NR	NR	NR	NR	Ø	8	Ø	8
11		53	7	12	4	NR	9	270K	18,577	18,992	Ø	8
12		53	7	12	4.	NR	8	240K	37.174	0	Ø	0
13		54		12	3.5	NR	8	240K	0	12.554	Ø	8
14		53.5	15	15.5	3.5	NR	8	240K	0	(A) = 27	Ø	Ø
15		54	7	12	3.5	NR	9	270K	0	18,904	Ø	Ø
16		54.75	7	12.25	3	NR	9	270K	Ø	0	Ø	Ø
eachate Ha	uled Subt	otal										

(1) If depth is greater than 24 inches (2.0 feel): Contact Supervisor immediately. Complete Evaluation Report Form.

Comments: Dec. 14, 24 and 28 Pump down Due To Fuel Problems

Prepared by M. Walkens

# LEACHATE DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Year) Dec. 95

	Active	(1) Phase IV	Station	Phase IV	Phase III	Station	Depth in	Storage	Leach	ate Hauled	Leachate	
	Area	Piezometer	No. 3	Riser	Riser	No. 4	500K Tank	500K Tank	Contractor	County	Recirculation	Rainfail
Dale	(acres)	(inches)	(inches)	(inches)	(inches)	(inches)	(feet)	(gallons)	(gallons)	(gallons)	(gallons)	(inches)
17		NR	NR	NR	NR	NR	NR	NR	0	Ø	Ø	Ø
18		54.75	7	12.25	3.75	NR	10.5	315K	Ø	11,500	Ø	Ø
19		55.5	7	12.25	3	NR	10.5	315K	12.415	Ø	Ø	Ø
20		55.25	_7	12	3	NR	//	330K	24,902	16,100	Ø	0
21		53.75	_7	11.75	3	NR	10	300K	12,336	Ø	Ø	Ø
22		54	_7_	12	3	NR	10	300K	25,032	Ø	Ø	0
23		54	7	12	3	NR	9	270K	Ø	Ø	Ø	Ø
24		NR	18	NR	NR	NR	NR	NR	Ø	Ø	Ø	Ø
25		NR	MR	NR	NR	NR	NR	NR	Ø	Ø	8	
26	-	53	7	12	2.75	NR	10.5	3/5K	24,824	Ø	Ø	Ø
27		53.25	7	11.75	3	NR	10	300K	24.839	Ø	Ø	Ø
28		52.5	21	21.25	3	NR	8	240K	0	Ø	Ø	Ø
29		51.5	7	12	3	NR	8.5	255K	Ø	Ø	Ø	Ø
30		52	7	12	3	NR_	10	300K	Ø	Ø	Ø	Ø
31		NR	NR	NR	NR	NR	NR	NR	Ø	Ø	B	.5
Leachate H	auled Sub	lotal										•

(1) It dopto is greater than 24 inches (2.0 feet): Contact Supervisor immediately. Complete Evaluation Report Form.	i.		
Comments:			
	(		
		-	•
Leachale Hauled Month Total:		 	

Prepared by: W. Wallhers

# EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Year) Dec. 95

	Depth in		Treated			Treated		<del></del>	<del></del>
	Effluent	Leachate	Effluent	Treated Effl	uent Hauled	Effluent	Treated Effluent		(1) Effluent
}	Pond	Treated .	Sprayed	Contractor	County	Recirculation	Stored	Time at End of	Runoff to Retention
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	Rainfall	
1	29	60,000	42,900	12,200	Ø	Ø	17,100	Kaimaii	Area (Y/N)
2	27	40,000	42,900	55, 654	Ø	Ø	17,100		1/
3	NR	60,000	ĺØ.	Ø	Ø	Ø	60,000		/
4	28	10,000	42,900	36,887	Ø	8,500	17,100		1/
5	25	60,630	42,900	30,887	Ø	8,500	17.730		N
6	30	60,100	42,900	12,300		8,500	17, 200		W
7	25	10,290	Ø	12,300		Ø	60,290		_
8	29	60,230	30,450	61,670	Ø	17,000	29,780	_	$\sim$
9	29	60,620	0	61,982	Ø	17,000	60,620	^	-
10	NK	60,000	Ø	Ø		Ø	60,000	_	
11	44	60,340	42,900	43,236	Ø	Ø	17,440	-	$\sim$
12	36	60,200	10,525	24,661		17,000	49,675		$\mathcal{N}$
13	31	60,250		Ø		17,000	60,250	_	
14	31	60,250		Ø	0	26,000	60,250	_	~
15	21	60,250		61,782		8,500	60,250		_
16	27	60,300	$\mathscr{Q}$	61,970		8,500	60,300		_

(1) If yes: Contact Supervisor immediately and stop spray irrigation. Complete Evaluation Report Form.

Comments: Dec. 13, 14, 15, 16 - No Effinent	Sprayed due To Electrical Problems

Prepared by M. Mallhana

# EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL (Month/Year) Dec. 95

	Depth in		Treated			Treated	Treated		(1) Effluent
	Effluent	Leachate	Effluent	Treated Eff	luent Hauled	Effluent	Effluent	Time at	Runoff to
	Pond	Treated	Sprayed	Contractor	County	Recirculation	Stored	End of	Retention
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	Rainfall	Area (Y/N)
17	NR	60,050	Ø	Ø	Ø	Ø	60,050	-	
18	42	60,150	12,000	62,043	Ø	P	48,150		N
19	<del></del>	60,100	20,210	49,602	Ø	Ø	39,890	_	N
20	<del></del>	60,250	30,580	36,974	Ø	8500	29,670		N
21	41	60,250	36,000	49,472	Ø	17,000	36,250	-	N
22	38	Le 0, 110	30,000	36,949	Ø	Ø	50,110		N
23	4/	60,310	30,000	62,146	Ø	17,000	30,310	)	N
24	NR	60,080	30,000	61,500	Ø	ı 'Ø	30,080	1	$\mathcal{N}$
25	NK	60,220	30,000	Ø	Ø	Ø	30,220	,	N
26		60,180	30,020	37,025	Ø	8,500	30,160	1	$\mathcal{N}$
27	39	60,200	30,000	36,945	Ø	8,500	30,200	1	N
28	41	60,160	45,000	37,268	Ø	Ø	15,160		$\mathcal{N}$
29	40	60,190	45,000	37,290	Ø	8 500	15,190		/
30	36e	100,350	<u> </u>	67,600	Ø	Ø	60,350	<b>,</b>	1
31	NK	60,040	Ø	61,500	Ø	Ø	60,040	_	-

(1) If yes: Contact Supervisor immediately and stop spray irrigation. Complete Evaluation Report Form.

Comments:

Prepared by: M. Malthers

# DAILY LEACHATE COLLECTION AND RECOVERY SYSTEM

# **EVALUATION REPORT**

SOUTHEAST COUNTY LANDFILL

(Month/Year) Dec 95

								Date								
Action	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Piezometer Phase IV	V 1 5 5		- j. p. j. j. j.	444	in the	200	- Jante	1,415,71		\$ 1.50	1.5	5-6-1-4 <u>8</u>	10 Maria		15	
Low Level Operation, depth less than or equal to 12 inches.													1 1000-01			1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1
Normal Operation, depth greater than 12 inches and less than or equal to 24 inches.																
High Level Operation, depth greater than 24 inches and less than or equal to 30 inches. Increase leachate removal and contact supervisor immediately.	<b>\</b>	\\ \sqrt{1}	NR		V				-	NR				. ~	1	
Sump No. 4 Phase VI (Stormwater)			- 1 1 E		- i.	1446								<del> </del>		
Normal Operation, level is greater than or equal to 6 inches above level measured in Phase IV pieaometer.			NR	/		<b>\</b>	ļ —	NR	NR	NR	10	10	NR	10	110	110
If level is more than 6 inches below the level measure in Phase IV piezometer, stop pumping to Basin D.									/ • / •	/ • / \	NK	/V /C	/V/\.	/V /\_	VVA	VV N
5,000 Gallon Tank at LTRF		7	n fet		135.3	The 1/4/17	N. Peni	75 7	•			6 3 5 F	-		71. 1	
Normal Operation.			NR							NR						
If level is greater than 11 feet, increase treatment, hauling, or recirculation.				/				<u> </u>		/ / / \		<u> </u>	V	V	V	V
If level is less than 6 feet, decrease or stop hauling, recirculation.																
Effluent Pond					207	112.00										<del></del>
Normal Operation.			NR		1./					NR			<del></del>			
If level is 6 inches or less, stop irrigation, recirculation, hauling.			7			<b>-</b>		V.		/ / / \	<u> </u>					V
If level is greater than 4 feet, increase irrigation, recirculation, hauling.													:			
Observed runoff of effluent to stormwater basins?					9.7				-							
No.			NR				MR		NR	NR			1	سمسا	<u> </u>	-
If yes, contact supervisor immediately. Stop spray irrigation. Identify Basin and type.							, , , ,	<b>v</b>	~ / /	<del>~ • / \</del>		·				
Runoff Type To Basin	,															
1 = Severe A, B, C,																
2 = Moderate											J					
3 = Minor		ĺ					1				Ì					

Comments/Remedial Action:

# DAILY LEACHATE COLLECTION AND RECOVERY SYSTEM EVALUATION REPORT SOUTHEAST COUNTY LANDFILL

(Month/Year) Dec. 95

Action		1	1		<del></del>			Date							
Piezometer Phase IV	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
Low Level Operation, depth less than or equal to 12 inches.	<u> </u>		Approxime	1997	OB W		<u> </u>		1.0	- Weigh	st tray is				
Normal Operation, depth greater than 12 inches and less than or equal to 24 inches.				- <u></u>											
High Level Operation, depth greater than 24 inches and less than or equal to 30 inches. Increase leachate removal and contact supervisor immediately.	WR	V	/	/	/		/	NR	NR			/	V	V	~/
Sump No. 4 Phase VI (Stormwater)		1			1000			<del> </del>							
Normal Operation, level is greater than or equal to 6 inches above level measured in Phase IV pieaometer.	NR	NR	NR	NR	NR		v.R	NR	NR	NR	1/R	NR	NR	110	1/6
If level is more than 6 inches below the level measure in Phase IV piezometer, stop pumping to Basin D.									7 . , , ,	VIC		/ -	, , , ,	<i>I.</i> V N	
5,000 Gallon Tank at LTRF			1 7 5 7	21.25	31 Ye 142	<del></del>	V. 11 4								
Normal Operation.	NR						V	NR	NR						NR
If level is greater than 11 feet, increase treatment, hauling, or recirculation.								7.7.	7 7 7 .						700
If level is less than 6 feet, decrease or stop hauling, recirculation.															
Effluent Pond	100		a T	1676	354 j. k. s.	1.40	, + + 3	F v	1 10	1	<del></del>			<del></del>	
Normal Operation.	NR							NR	NR		1/				NR
If level is 6 inches or less, stop irrigation, recirculation, hauling.								7. 8 - 3 -	7.0,0						707
If level is greater than 4 feet, increase irrigation, recirculation, hauling.															
Observed runoff of effluent to stormwater basins?									-					<del>-</del>	
No.	NK	N	V	سيا				- V					-		1/1
If yes, contact supervisor immediately. Stop spray irrigation. Identify Basin and type.									/-						707
Runoff Type To Basin				ĺ					İ		.		!		
1 = Severe A, B, C, D								ļ	Į	1		}			
2 = Moderate			ĺ	• •	ļ	1		j	[	ŀ	,				
3 = Minor	i I		-	1	·		· ]	}	ŀ		-				

ruments/Memedial Action:	
71-71-71	
pared by Malkenso	<del></del>

### 1995 LEACHATE BALANCE SUMMARY SOUTHEAST COUNTY LANDFILL HILLSBOROUGH COUNTY, FLORIDA

		Leachate Arriving at LTRF		Leachate/Effl	uent Leaving LTF	RF		Inflow/O	utflow Balance	For LTRF
		Leachate	Total Leach. Hauled	Total Eff.	Leachate Rec.	Effluent	Effluent	Total Inflow	Total Outflow	Balance
	Rainfall	Pumped to LTRF	From LTRF	Hauled	From LTRF	Rec.	Sprayed	To LTRF	From LTRF	For Month
Month	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)
January	4.60	3,104,000	3,166,000	(1) 0	0	0	0	3,104,000	3,166,000	(62,000)
February	2.40	4,063,000	2,942,000	(1) 0	0	0	650,000	4,063,000	4,062,000	1,000
March	1.90	3,467,000	2,320,000	(1) 0	0	113,000	932,000	3,467,000	3,705,000	(238,000)
April	1.60	2,625,000	1,124,000	393,000	60,000	0	700,000	2,625,000	2,528,000	97,000
May	2.40	2,331,000	865,725	652,689	0	0	1,000,270	2,331,000	2,255,439	75,561
June	8.30	2,369,000	904,543	758,000	0	0	568,520	2,369,000	2,252,277	116,723
July	17.90	2,296,000	845,087	1,185,000	0	. 0	319,750	2,296,000	2,236,821	59,179
August	15.80	2,940,000	1,620,842	1,050,000	0	0	398,520	2,940,000	2,997,072	(57,072)
September	8.80	2,939,000	1,696,897	783,000	0	25,500	507,500	2,939,000	3,168,909	(229,909)
October	5.40	3,130,000	972,984	865,000	0	76,500	600,480	3,130,000	2,763,129	366,871
November	4.30	2,539,360	699,787	1,016,000	0	17,000	785,275	2,539,360	2,465,827	73,533
December	0.50	2,570,333	525,473	1,113,000	0	173,900	661,185	2,570,333	2,391,573	178,760
								<u> </u>		
YTD Total	73.90	34,373,693	17,683,338	7,815,689	60,000	405,900	7,123,500	34,373,693	33,992,047	

Notes

1. Effluent quantities not measured separately.

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# SOUTHEAST LANDFILL TEMPORARY PUMP STATION NO. 5 CONTROL WELL DECEMBER 1995

DAY	DEPTH (Inches)
1	well purged
2	NR
3	NR
4	20.04
5	25.50
6	25.00
7	25.50
8	23.50
9	24.00
10	NR
11	23.50
12	23.50
13	23.00
14	25.50
15	24.25
16	24.00
17	NR
18	24.00
19	24.00
20	23.75
21	23.75
22	24.00
23	23.00
24	NR
25	NR
26	23.00
27	23.75
28	32.25
29	25.25
30	24.00
31	NR

0995029.11\TEMP5LEV.WB2

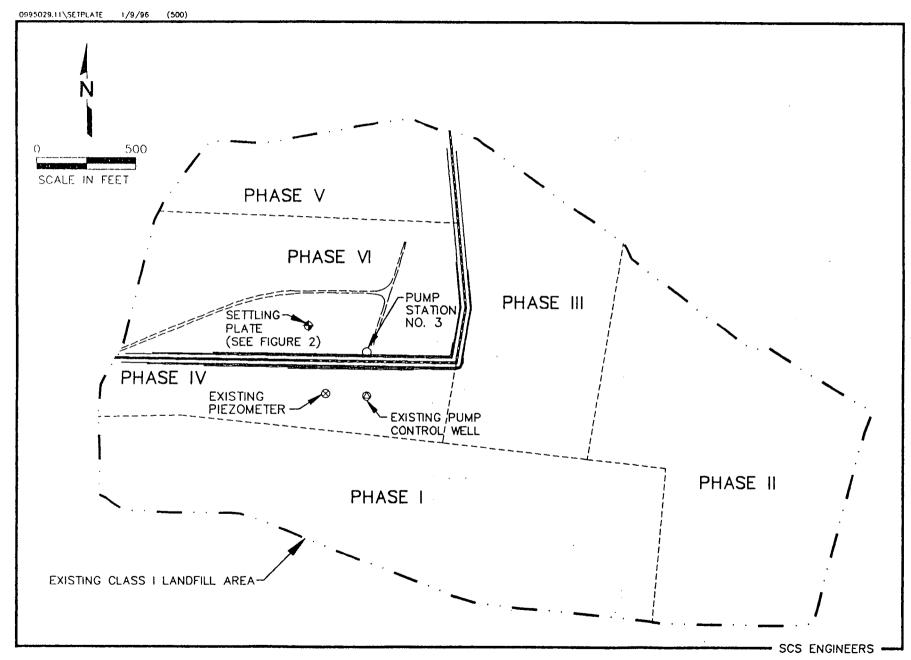


Figure 1. As-Built Phase VI Settling Plate Location.

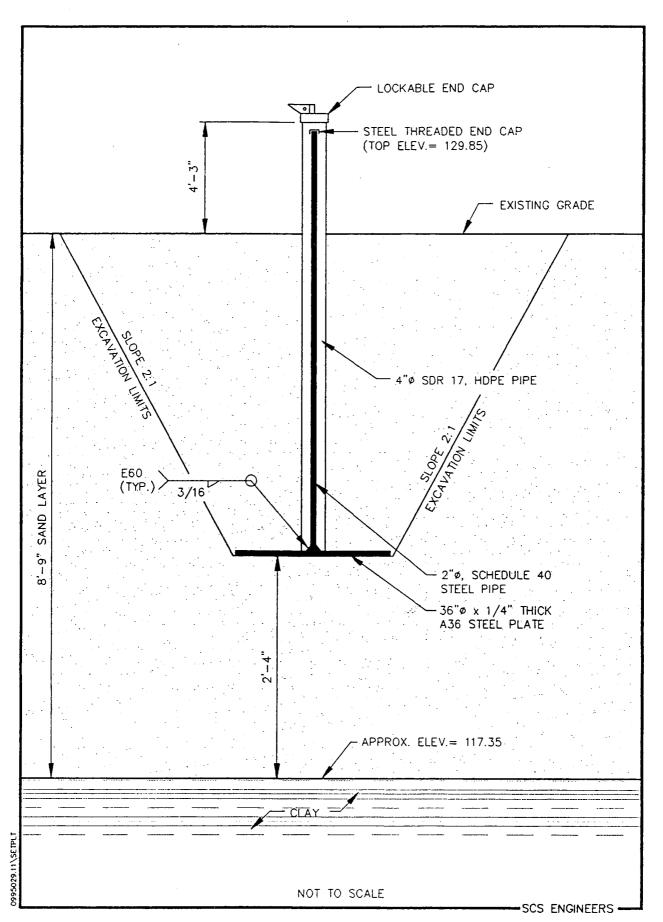


Figure 2. As—Built Phase VI Settlement Monitoring Plate Detail.

# HILLSBOROUGH COUNTY

# Florida

Office of the County Administrator
Daniel A. Kleman

BOARD OF COUNTY COMMISSIONERS

Dottie Berger Phyllis Busansky Joe Chillura Chris Hart Jim Norman Ed Turanchik Sandra Helen Wilson



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Department of Environmental Protection
SOUTHWEST DISTRICT

December 5, 1995

Mr. Kim Ford, P.E.
Solid Waste Permitting
Florida Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

RE: Southeast County Landfill - Leachate Management

Dear Mr. Ford:

In accordance with the Hillsborough County Department of Solid Waste's (DSW) Leachate Management Plan for the Southeast County Landfill (Landfill), the DSW is providing the Landfill's Water Balance Report Form for the month of November 1995. In addition, the DSW is providing the November 1995 field data forms for the Landfill, the daily leachate and collection system evaluation reports, and the Year-to-Date Leachate Balance Summary. In addition, the DSW is providing a new clay elevation form, survey data form, and a table showing the up-to-

This information is being provided to the Florida Department of Environmental Protection (DEP) and the Hillsborough County Environmental Protection Commission as an update on the DSW's leachate management efforts for the Landfill. This information is being provided in response to both the permitting and enforcement issues at hand.

Please advise should you have any questions or require additional information at this time.

date leachate level readings at the recently constructed pump control well.

Sincerely.

Patricia V. Berry

Landfill Services Section Manager

Department of Solid Waste

Attachments

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

Post Office Box 1110 - Tampa, Florida 33601 An Affirmance Action/Equal Opportunity Employer

## SCS ENGINEERS

December 5, 1995 File No. 0995029.11

Ms. Patricia V. Berry Hillsborough County Department of Solid Waste P. O. Box 1110 Tampa, Florida 33601



Subject: November 1995, Leachate Water Balance Report Forms

Southeast County Landfill, Hillsborough County, Florida

Dear Patty:

Please find attached copies of the leachate water balance report forms for the month of November 1995, and the year to date summary. Also find attached the approximate top clay elevations tracking form, survey data form, and a table showing the up-to-date leachate level readings at the proposed pump control well. The leachate water balance forms were created from data provided by Mr. Matt Matthews from the Hillsborough County Department of Solid Waste and were revised to include metered leachate removal quantities and separate quantities for temporary pump station No. 3 and No. 5.

If you have any questions, please do not hesitate to call.

Very truly yours,

Larry/E/. Ruiz

Senior Project Engineer

Robert B. Gardner, P.E.

Vice President SCS ENGINEERS

RBG/LER:ler Enclosures

cc: Matt Matthews

### 1995 YEAR TO DATE LEACHATE BALANCE SUMMARY SOUTHEAST COUNTY LANDFILL HILLSBOROUGH COUNTY, FLORIDA

		Leachate Arriving at LTRF		Leachate/Effl	uent Leaving LTF	RF	_	Inflow/Out	flow Balance F	or LTRF
		Leachat <b>e</b>	Total Leach. Hauled	Total Eff.	Leachate Rec.	Effluent	Effluent	Total Inflow	Total Outflow	Balance
	Rainfall	Pumped to LTRF	From LTRF	Hauled	From LTRF	Rec.	Sprayed	To LTRF	From LTRF	For Month
Month	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal:.)	(gal.)	(gal.)
Jan	4.60	3,104,000	3,166,000	(1) 0	0	0	0	3,104,000	3,166,000	(62,000)
Feb	2.40	4,063,000	2,942,000	(1) 0	0	0	650,000	4,063,000	4,062,000	1,000
March	1.90	3,467,000	2,320,000	(1) 0	0	113,000	932,000	3,467,000	3,705,000	(238,000)
April	1.60	2,625,000	1,124,000	393,000	60,000	0	700,000	2,625,000	2,528,000	97,000
May ·	2.40	2,331,000	865,725	652,689	0	0	1,000,270	2,331,000	2,255,439	75,561
June	8.30	2,369,000	904,543	758,000	0	0	568,520	2,369,000	2,252,277	116,723
July	17.90	2,296,000	845,087	1,185,000	0	0	319,750	2,296,000	2,236,821	59,179
August	15.80	2,940,000	1,620,842	1,050,000	0	0	398,520	2,940,000	2,997,072	(57,072)
Septembe	8.80	2,939,000	1,696,897	783,000	0	25,500	507,500	2,939,000	3,168,909	(229,909)
October	5.40	3,130,000	972,984	865,000	0	76,500	600,480	3,130,000	2,763,129	366,871
November	4.30	2,539,360	699,787	1,016,000	0	17,000	785,275	2,539,360	2,465,827	73,533
							-			
YTD Total	73.40	31,803,360	17,157,865	6,702,689	60,000	232,000	6,462,315	31,803,360	31,600,474	202,886

#### Notes:

- 1. Effluent quantities not measured separately.
- 2. If the effluent bypass is ever used to pump effluent back to the LTRF, this table must be modified.

#### **BEST AVAILABLE COPY**

#### LEACHATE WATER BALANCE REPORT FORM **NOVEMBER 1995**

SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FLORIDA

		11		111	IV	V	VI	VII ·	VIII	IX	X	ΧI	XII	XIII	XIV .	XV	XVI	XVII	XVIII
		· Chicago and Chicago				Est. Depth	Est.	Pumped	Pumped	Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Total	
		Area			Effluent	Over	Landfill	From	From	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir-	Effluent	Landfill
		(acres)		Rainfall	Pond	Liner	Storage	Sta. No 3	Sta. No. 5	to LTRF	Tank	at LTRF	Hauled	culation	Storage	Sprayed	culation	Hauled	Evapor.
Day		active	int.	(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)
1	23.2	5.0	92.2		34.0	59.0	10,112,000	72,360	. 0	, = 1000	144,000	44,640	0	0	109,000	42,900	8,500	37,000	42,000
2	23.2	5.0	92.2	0.0	36.0	58.0	9,649,000	76,570	15,430	92,000	202,000	60,130	0	0	116,000	0	0	37,000	0
3	23.2	5.0	92.2	0.0	37.0	59.0	10,112,000	83,400	0	83,400	202,000	60,040	18,647	0	120,000	42,900	0	43,000	35,000
4	23.2	5.0	92.2	0.0	24.0	59.0	10,112,000	76,500	0	76,500	259,000	60,150	0	0	75,000	42,900	0	31,000	35,000
5	23.2	5.0	92.2	0.0	NR	NR	NR	76,500	. 0	76,500	NR	59,900	0	0	NR	0	0	0	0
6	23.2	5.0	92.2	0.0	42.0	59.0	10,112,000	71,390	12,010	83,400	288,000	42,810	50,335	0	138,000	42,900	0	31,000	35,000
7	23.2	5.0	92.2	0.0	36.0	59.0	10,112,000	60,370	25,230	85,600	259,000	60,590	31,070	0	116,000	42,900	0	31,000	35,000
8	23.2	5.0	92.2	0.4	24.0	58.0	9,649,000	58,210	19,990	78,200	259,000	55,020	.19,199	0	75,000	. 0	0	68,000	0
9	23.2	5.0	92.2	1.5	31.0	59.0	10,112,000	62,640	16,860	79,500	259,000	60,030	6,144	0	99,000	0	0	63,000	0
10	23.2	5.0	92.2	0.0	35.0	58.0	9,649,000	57,890	18,710	76,600	288,000	60,000	37,366	0	113,000	0	0	25,000	0
11	23.2	5.0	92.2	0.0	31.0	59.0	10,112,000	66,530	21,170	87,700	274,000	60,110	0	0	99,000	0	0	62,000	0
12	23.2	5.0	92.2	0.0	NR	NR	NR	66,530	21,170	87,700	NR	59,940	0	0	NR	0	0	0	<del>,</del>
13	23.2	5.0	92.2	0.0	40.0	60.0	10,576,000	66,020	25,980	92,000	317,000	60,000	18,633	0	131,000	42,900	0	62,000	35,00
14	23.2	5.0	92.2	0.0	30.0	59.0	10,112,000	49,650	29,550	79,200	317,000	59,920	12,700	0	95,000	42,900	0	62,000	35,000
15	23.2	5.0	92.2	0.0	24.0	56.0	8,721,000	45,680	29,020	74,700	374,000	59,010	55,288	0	75,000	42,900	0	25,000	35,000
16	23.2	5.0	92.2	0.0	26.0	56.0	8,721,000	60,050	16,050	76,100	331,000	60,390	61,798	0	81,000	40,000	0	13,000	32,000
17	23.2	5.0	92.2	0.0	25.0	56.0	8,721,000	7,780	83,320	91,100	302,000	61,000	37,257	0	78,000	42,900	0	6,000	35,000
18	23.2	5.0	92.2	0.0	27.0	57.0	9,185,000	75,550	0	75,550	302,000	60,340	0	0	85,000	0	0	37,000	0,000
19	23.2	5.0	92.2	Trace	NR	NR	NR	75,550	0	75,550	NR	59,580	0	0	NR	0	0	07,000	0
20	23.2	5.0	92.2	0.0	46.0	57.0	9,185,000	82,000	. 0	82,000	345,000	60,320	28,930	0	154,000	46,000	0	62,000	37,000
21	23.2	5.0	92.2	0.0	33.0	57.0	9,185,000	52,160	26,540	78,700	259,000	60,190	31,093	. 0	106,000	44,000	8,500	43,000	42,000
22	23.2	5.0	92.2	0.0	27.0	56.0	8,721,000	17,440	75,810	93,250	317,000	60,300	72,861	0	85,000	39,200	0	12,000	32,000
23	23.2	5.0	92.2	0.0	NR	NR	NR	17,440	75,810	93,250	NR	60,330	18,600	0	NR	32,175	0	19,000	26,000
24	23.2	5.0	92.2	0.0	30.0	57.0	9,185,000	15,230	68,470	83,700	302,000	60,480	25,163	0	95,000	49,300	0	12,000	40,000
25	23.2	5.0	92.2	0.0	28.0	57.0	9,185,000	0	102,150	102,150	317,000	60,260	0	0	88,000	0	0	56,000	0
26	23.2	5.0	92.2	0.0	NR	NR	NR	0	102,150	102,150	NR	59,750	0	0	NR	0	0	0	0
27	23.2	5.0	92.2	0.0	28.0	56.0	8,721,000	0	86,300	86,300	374,000	60,190	56,487	0	88,000	51,000	0	37,000	41,000
28	23.2	5.0	92.2	0.0	32.0	56.5	8,953,000	0	93,600	93,600	345,000	60,210	43,477	0	102,000	46,500	0	61,000	38,000
29	23.2	5.0	92.2	0.3	30.0	56.0	8,721,000	. 0	93,300	93,300	331,000	60,200	31,332	0	95,000	0	0	56,000	00,000
30	23.2	5.0	92.2	0.2	28.0	57.0	9,185,000	0	87,300	87,300	331,000	60,210	43,407	0	88,000	51,000	0	25,000	41,000
													. 37.07		23,000	0.,000		20,000	41,000
															7				
Total				4.30	784.0	1440.5	236,808,000	1,393,440	1,145,920	2,539,360	7,298,000	1,766,040	699,787	0	2,506,000	785,275	17,000	1,016,000	651,000
Average				0.15	31.4	57.6	9,472,000	46,000	38,000	85,000	243,000	59,000	35,000	0	100,000	44,000	9,000	39,000	36,000
														-	122623			32 Revised by BLJ	

- 1. NR = No Records.
- 2. Column II, total area with waste is 120.4 acres (Phases I-IV).
- 3. Columns III and IV, field measured. Column III, Trace is less than 0.01 inches and is not included in total.
- 4. Column V, estimated from depth in Phase IV Piezometer.
- 5. Column VI, estimated from Column V and approximate volume with top of clay elevation at 117.0 feet.
- 6. Column VII calculated based on average 180 gpm and hour conversion.
- 7. Column VIII calculated by subtracting VII from flow meter reading.
- 8. Column IX, quantity from flow meter.
- 9. Column X, calculated from depth in 500,000 gal. leachate tank.
- 10. Columns XI and XV, quantities from flow meters.
- 11. Columns XII, XIII, XVI, and XVII, quantities calculated from truck weight.
- 12. Column XVIII, 80.8% of the daily values from Columns XIII, XV and XVI.
- 13. Values in italic are substitute for missing data and are based on averaged values.

### **BEST AVAILABLE COPY**

#### FIELD DATA ENTRY FORM NOVEMBER 1995

### SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FLORIDA

	II	111	IV	V	VI	VII	VIII	IX	X	ΧI	XII	XIII	XIV	XV	XVI	XVII	XVIII	XIX
l	l		_														Pumped to	
	Active	Depth in	Stormwater	Phase III	Phase IV	Phase IV		Leachate	Hauled	Leachate	Effluent	Hauled	Effluent	Leachate	Effluent	Depth in	LTRF	Sta. No. 3
	Area		In Sump No. 4	Riser	Riser	Piezometer	Rainfall	Contractor	County	Recirc.	Contractor	County	Recirc.	Treated at	Sprayed	500K Tank	Reading	Reading
Day	(ac.)	(in.)	(in.)	(in.)	(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	LTRF (gal.	(gal.)	(ft.)	(gal.)	(hours)
1	5.0	34.0	75.0	3.0	16.0	59.0	1.9	0	0	0	37,395	0	8,500	44,640	42,900	5.0		2,972.95
2	5.0	36.0	74.0	4.0	15.0	58.0	0.0	0	0	0	37,456	0	0	60,130	0	7.0	66,000	2,979.65
3	5.0	37.0	74.0	3.0	15.0	59.0	0.0	18,647	0	0	43,437	0	0	60,040	42,900	7.0	158,000	2,986.74
4	5.0	24.0	72.0	3.0	17.0	59.0	0.0	0	0	0	30,853	0	0	60,150	42,900	9.0	241,400	2,994.38
5	5.0	NR	NR	NR	NR	NR	0.0	0	0	0	[0	0	O	59,900	0	NR	317,900	3,001.33
6	5.0	42.0	72.0	6.0	22.0	59.0	0.0	31,168	19,167	0	30,734	0	0	42,810	42,900	10.0	394,400	
7	5.0	36.0	71.0	3.0	13.0	59.0	0.0	31,070	0	0	30,742	0	0	60,590	42,900	9.0	477,800	
8	5.0	24.0	84.0	4.0	16.0	58.0	0.4	0	19,199	0	68,075	0	0	55,020	0	9.0	563,400	3,020.48
9	5.0	31.0	78.0	5.0	16.0	59.0	1.5	6,144	0	0	63,038	0	0	60,030	0	9.0	641,600	3,025.87
10	5.0	35.0	78.0	5.0	15.0	58.0	0.0	37,366	0	0	24,642	0	0	60,000	0	10.0	721,100	3,031.67
11	5.0	31.0	76.0	6.0	21.0	59.0	0.0	0	0	0	61,894	0	0	60,110	. 0	9.5	797,700	3,037.0
12	5.0	NR	NR	NR	NR	NR	0.0	0	0	0	0	0	0	59,940	. 0	NR	885,400	3,043.15
13	5.0	40.0	76.0	7.0	16.0	60.0	0.0	18,633	0	0	62,090	0	0	60,000	42,900	11.0	973,100	3,049.35
14	5.0	30.0	76.0	6.0	15.0	59.0	0.0	12,700	0	0	61,906	0	0	59,920	42,900	11.0	1,065,100	3,055.46
15	5.0	24.0	74.0	6.0	15.0	56.0	0.0	49,788	5,500	0	24,600	0	0	59,010	42,900	13.0	1,144,300	3,060.06
16	5.0	26.0	74.0	4.0	15.0	56.0	0.0	61,798	0	0	12,530	0	Ö	60,390	40,000	11.5	1,219,000	3,064.29
17	5.0	25.0	73.0	3.0	15.0	56.0	0.0	31,257	6,000	0	6,200	0	0	61,000	42,900	10.5	1,295,100	3,069.85
18	5.0	27.0	73.0	3.0	17.0	57.0	0.0	0	0	0	37,425	0	0	60,340	0	10.5	1,386,200	3,070.57
19	5.0	NR	NR	NR	NR	NR	Trace	0	0	0	0	0	0	59,580	0	NR	1,461,750	3,077.51
20	5.0	46.0	77.0	4.0	15.0	57.0	0.0	12,430	16,500	0	62,144	0	0	60,320	46,000	12.0	1,537,300	3,084.44
21	5.0	33.0	73.0	5.0	15.0	57.0	0.0	31,093	0	0	43,241	0	8,500	60,190	44,000	9.0	1,619,300	3,091.30
22	5.0	27.0	72.0	7.0	17.0	56.0	0.0	61,861	11,000	0	12,300	0	0	60,300	39,200	11.0	1,698,000	3,096,13
23	5.0	NR	NR	NR	NR	NR	0.0	18,600	0	0	18,600	0	0	60,330	32,175	NR	1,791,250	3.097.75
24	5.0	30.0	72.0	6.0	13.0	57.0	0.0	25,163	0	0	12,400	0	0	60,480	49,300	10.5	1,884,500	3,099.36
25	5.0	28.0	71.0	4.0	13.0	57.0	0.0	0	0	0	55,895	0	0	60,260	. 0	11.0	1,968,200	3,100.77
26	5.0	NR	NR	NR	NR	NR	0.0	0	0	0	0	0	0	59,750	Ö	NR	2,070,350	3,100.77
27	5.0	28.0	70.0	5.0	13.0	56.0	0.0	37,257	19,230	0	37,122	0	0	60 190	51,000	13.0	2,172,500	3,100.77
28	5.0	32.0	70.0	4.0	12.0	56.5	0.0	43,477	. 0	0	60,815	0	0	60,210	46,500	12.0	2,258,800	3,100.77
29	5.0	30.0	82.0	4.0	9.0	56.0	0.3	12,215	19,117	0	55,846	0	0	60,200	0	11.5	2,352,400	3,100.77
30	5.0	28.0	80.0	3.0	13.0	57.0	0.2	43,407	0	0	24,600	0	0	60,210	51,000	11.5	2,445,700	
												·		,				3,.00.77
												• • • • • • • • • • • • • • • • • • • •				<del></del>		

#### Notes:

- 1. NR = No Records.
- 2. Columns II-VIII, field measured. Column VIII, Trace is less than 0.01 inches.
- 3. Column VI, if level exceeds 24 inches, leachate withdrawal from landfill must increase.
- 4. Column VII, Phase IV piezometer began monitoring on 7/10/95.
- 5. Columns IX-XIV, quantities calculated from truck weight.
- 6. Columns XV and XVI, quantities from flow meters.
- 7. Column XVII, field measured.
- 8. Column XVIII, reading from flow meter.
- 9. Column XIX, Hour reading from TPS-3.
- 10. Values in italic are substitute for missing data and are based on averaged values.

# APPROXIMATE TOP OF CLAY ELEVATIONS SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

	PHASE III		PHASE IV			PHASE VI	
DATE	Riser 1	Riser 2	Piezometer	Pump Well	Pump Station 3	Pump Station 4	Settling Plate
28-Dec-93	NR	NR	NR	NR	118.97	NR	NR
05-Dec-94	NR	NR	NR	NR	118.76	NŖ	NR
26-Jan-95	NR	NR	NR	NR	118.59	119.01	ŇR
22-Feb-95	119.89	118.09	NR	NR	118.59	119.00	NR
13-Jul-95	NR	NR	NR	NR	118.50	118.98	NR
21-Nov-95	119.81	117.80	116.45	116.55	118.45	118.93	NR
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# SURVEY DATA ENTRY FORM SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

	PHASE III		PHASE IV			PHASE VI	<del></del>
DATE	Top Casing Riser 1	Top Casing Riser 2	Top Casing Piezometer	Top Casing Pump Well	Top Pump Station 3	Top Pump Station 4	Top Rod Settling Plate
12/28/93	NR	NR	NR	NR	130.21	NR	NR
12/5/94	NR	NR	NR	NR	130.01	NR	NR
1/26/95	NR	NR	NR	NR	129.84	128.71	NR
2/22/95	134.29	132.58	NR	NR	129.84	128.70	NR
7/13/95	NR	NR	NR	NR	129.75	128.68	NR
11/21/95	134.21	132.29	142.26	142.05	129.70	128.63	NR
						•	_
							·
			_				-

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# SOUTHEAST LANDFILL PUMP WELL LEVEL MONITORING

DATE	TIME	READING (Feet)	DEPTH (Feet)
November 21, 1995	1:10 p.m. 3:30 p.m. 4:15 p.m. 9:00 p.m.	25.8 22.2 22.37 22.9	Dry 3.3 3.13 2.6
November 22, 1995	3:00 a.m. 1:00 p.m. 3:45 p.m. 5:00 p.m.	22.75 22.78 22.78 22.95	2.75 2.72 2.72 2.55
November 24, 1995	7:30 a.m.	23.20	2.30
November 25, 1995	7:30 a.m.	23.35	2.15
November 28, 1995	7:30 a.m.	23.35	2.15
November 29, 1995	7:30 a.m.	23.35	2.15
November 30, 1995	7:30 a.m.	23.35	2.15
December 1, 1995	well purged		
December 4, 1995	7:30 a.m.	23.83	1.7

# LEACHATE DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

# (Month/Year) Nov. 1995

	Active	(1) Phase IV	Station	Phase IV	Phase III	Station	Depth in	Storage	Leacha	le Hauled	Leachate	,
Date	Area	Piezometer	No. 3	Riser	Riser	No. 4	500K Tank	500K Tank	Contractor	County	Recirculation	Rainfal
Date	(acres)	(inches)	(inches)	(inches)	(inches)	(inches)	(feet)	(gallons)	(gallons)	(gallons)	(gallons)	(inches
1		59	12	16	3	75	2	150 K		$\varnothing$		6.9
2		58	12	15	4	74	7	210 K		Ø		.0
3		59	12	15	3	74	7	210 K	18.647	Ø		.0
4		59	12	17	3	72	9	2701	<u> </u>	Ø		.0
5		NR	NR	NR	MR	WR	NR			Ø		.0
6		59	12	22	6	72	10	300 K	31,168	19.167		.0
7		59	12	13	3	71	9	270K	31,070			.0
8		58	12	16	4	84	9	270K	1	19,199		. 4
9		59	12	16	ا ک	78	9	270 K	6,144	Ø		1.5
10		58	12	15	5	78	10	300K	37,366	Ø	_	0
11		.59	12	21	6	76	9.5	285K	Ø	Ø		0
12		NR	NR	NR	NR	NR	NR	0	Ø	Ø		<b>②</b>
13	· ·	60	12	16	7	76	1/	330K	18,633	Ø		0
14		59	12	15	6	76	1/	330K	12,700	Ø		0
15		51	12	15	6	74		390 K	49,788	5,500		0
16		5 Ce	12	15	4	74	11.5	345 K	61.798	Ø		O
achate Ha	uled Subi	lotal					<i>i</i> .		7			

(1) If depth is greater than 24 inches (2.0 feet): Contact Supervisor immediately. Complete Evaluation Report Form.				
comments: CONTractor And County Pracks LAULING ESTIMENT	due	7,2	LOW TANK	
Depth And Increased Leachaire Treated				

Prepared by: 21. Marthans

# LEACHATE DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

# (Month/Year) Nov. 1995

	Active	(1) Phase IV	Station	Phase IV .	. Phase III	Station	Depth in	Storage	Leacha	le Hauled	Leachale	7
	Area	Piezometer	No. 3	Riser	Riser	No. 4	500K Tank	500K Tank	Contractor	County	Recirculation	Rainfall
Date	(acres)	(inches)	(inches)	(inches)	(inches)	(inches)	(feet)	(gallons)	(gallons)	(gallons)	(gallons)	(inches)
17		56	12	15	3	73	10.5	3151	3/, 257	6,000		
18		57	1.2	17	3	73	10.5		0	- ' Ø		0
19		NR:							Ø	0		0
20	<del></del>	57	12	15	4	77	12	360K	12,430	16,500		0
21		57	12	15	5	73	9	270K	31,093	Ø		0
22		56	12	17	7	72	1/	33 OK	<b>■</b> (0), 8(0)	1,000		-0
23	<del></del>	NR	H	oli da	y —				18,600	Ø		6
24		57	12	13/	6	72	10.5	315 K	25,163	Ø		0
25		57	12	13	4	7/	160	330K	Ø	0		0
26		NR	NR	NK	NB	NR	/VK	NR	0	Ø		0
27	<u> </u>	56	12	13	5	70	13	390K	37,257	19,230	·	0
28		56.5	12	12	4	70	12	360K	43,477	Ø		0
29	·	56	12	9	_4	82	11.5	34 <b>5</b> K	12,215	19.117		.3
30		57	12	13	_3	80	11.5	345K	43,407	0		. 2
31												
Leachate Ha	uled Sub	total						-				•

nents:	
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### EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

### (Month/Year) Nov. 1995

	Depth in		Treated		<del> </del>	<del>T</del>	T	· · · · · · · · ·	<del>,</del>
	Effluent	Leachate	Effluent	Treated Effi	ant Hauled	Treated Effluent	Treated	<u> </u>	(1) Effluent
	Pond	Treated	Sprayed	Contractor	County	Recirculation	Effluent Stored	Time at End of	Runoff to
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	Ì	Retention
1	34	44,640	42,900	37.395	(ganons)	8,500	1.74°	Rainfall	Area (Y/N)
2	36	60,130		37,456		2	60,130		
3	77	60,040	42,900	43,437	_	Ø	17.140		N
4	24	60,150.	42,900	30.853		Ø	17,250		<i>/</i> /
5	NR	59,900	-0			Ø	59,900		
6	42	(EST) 42,810	42,900	30,734		Ø			N
7	36	60,590	42,900	30,742		Ø	17,690		N
8	24	55,020		68,075		Ø	55,020		
9		60,030		63,038		Ø	60,030		_
10		60,000		24,642		Ø	60,000		
11	3/	60,110		61,894	<u>-</u>	0	60,110		
12		59,940		ED		Ø	59,940		
13		60,000	42,900	62,090	<del>_</del>	Ø	17,100		N
1	30	59,920	42,900	61,906		Ø	17,020		N
15	24	59.010	42,900	24,600		Ø	16.110		فر
16	26	60,390	40,000	12,538		Ø	20,390		N

(1) If yes: Contact Supervisor Immediately and stop spray Irrigation. Complete Evaluation Report Form.

Comments: 11/2, 8, 9 - No Efficient Sprayed due To RA:N

Prepared by: M. Walliamy

# EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL (Month/Year) 1995

	Depth in		Treated			Treated	Treated		(1) Effluent
ļ		Leachate	Effluent	Treated Efflu	uent Hauled	Effluent	Effluent	Time at	Runoff to
	Pond	Treated	Sprayed	Contractor	County	Recirculation	Stored	End of	Retention
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	Rainfall	Area (Y/N)
. 17	25	61,000	42,900	6,200		Ø	18,100		N.
18	27	60,340		37,425		Ø	60.340		-
19	NR	59,580		Ø		Ø	59,580		
20	46	60,320	46,000	62,14		0	14,320		N
21	<i>33</i>	60,190	44,000	43,241	<u> </u>	8500	16,190		עק
22	27	60,300	39,200	12,300		Ø	21,100		N
23	NR	60,330	32,175	18,600	-	Ø	28, 155		n
24	30	60,480	49,300	12,400		Ø	11, 180		N
25	28	60,260		55,895		Ø	60,260		
26	ALK	59,750	·	Ø		Ø	59,750		
27	28	60,190	51,000	37,122		Ø	9,190		N
28		60,210	46,500	30,815		ø	13,710		w
	30	60,200		55,846		Ø	60,200		
30	28	60,210	51,000	24,600		0	9,210		N
31									

(i) ii) iii Germae, Caper	visor infinediately and stop spray iniga	ition. Complete Evaluation Report	rom.	
Comments:				
· · · · · · · · · · · · · · · · · · ·				
•	• •			

Prepared by: M. Matthews

#### DAILY LEACHATE COLLECTION AND RECOVERY SYSTEM **EVALUATION REPORT**

SOUTHEAST COUNTY LANDFILL (Month/Year) Hovember 1995

	· · · · · · · · · · · · · · · · · · ·	Date															
Action		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Piezometer Phase IV		5	13.5	100	1 H 1	<b>全年"推出</b>	THE REPORT	<b>通数型</b>	1,50 g/s.	100	ilia di sera		<u> </u>		1	<del>                                     </del>	10
Low Level Operation, depth less than or equal to 12 inches.															ļ		
Normal Operation, depth greater than 12 inches and less than or equal to 24 inches.		-سائين															,
High Level Operation, depth greater than 24 inches and less than or equal to 30 inches. Increase leachate removal and contact supervisor immediately.		<b>₩</b>	1	-	~		-		~	~	~			•		-	•
Sump No. 4 Phase VI (Stormwater)				( ± + -		SW EX	#163 E	1.0								1	
Normal Operation, level is greater than or equal to 6 inches above level measured in Phase IV pieaometer.		/	-	-	•		V	~	<u></u>	-	~	•					~
If level is more than 6 inches below the level measure in Phase IV piezometer, stop pumping to Basin D.																	
5,000 Gallon Tank at LTRF	**************************************	4.50	13.115.	1	12.	- B) - 2	tering light.	No. The second	Tarter All	% - ±4	21.14		-				
Normal Operation.			V											-			
If level is greater than 11 feet, increase treatment, hauling, or recirculation.												· · · · ·					
If level is less than 6 feet, decrease or stop hauling, recirculation.																	
Effluent Pond				145 (47)		1.0	11/20								-		
Normal Operation.		-	•	-				-			-						
If level is 6 inches or less, stop irrigation, recirculation, hauling.															<del></del>		
If level is greater than 4 feet, increase irrigation, recirculation, hauling.															-		•—•
Observed runoff of effluent to stormwater basins?				VE. 1	* 1	$\mathrm{Sp}_{\mathbf{a}}(\mathbf{Y}_{\mathbf{a}}^{(i)}, \mathbf{y}_{\mathbf{a}}^{(i)})$		1.125	3 - 1. 1			1 1			1		<del></del>
No.				1							-						
If yes, contact supervisor immediately. Stop spray irrigation. Identify Basin and type.										-		-					
Runoff Type	To Basin																
1 = Severe	A, B, C, D				,				ŀ								
2 = Moderate	, 5, 5, 5																
3 = Minor		l	1					!									

Comments/Remedial Action:	
Prepared by: M. Walkins	

# DAILY LEACHATE COLLECTION AND RECOVERY SYSTEM EVALUATION REPORT

SOUTHEAST COUNTY LANDFILL (Month/Year) November 1995

Action			1					Date		<del></del>	*	***************************************			
Piezometer Phase IV	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
Low Level Operation, depth less than or equal to 12 inches.			- and drug from -		1.000	Palayan.	Strate of		Ser. 741						
Normal Operation, depth greater than 12 inches and less than or equal to 24 inches.					<del> </del>							<del> </del>			
High Level Operation, depth greater than 24 inches and less than or equal to 30 inches. Increase leachate removal and contact supervisor immediately.	-	_		-	_		·					ن ا		-	
Sump No. 4 Phase VI (Stormwater)			14.	1. 15.	. ::51/::	1234.5%	1,420	2,250	14 12		<del> </del>	<del></del>	127		7
Normal Operation, level is greater than or equal to 6 inches above level measured in Phase IV pieaometer.	-				_	_					_	-			
If level is more than 6 inches below the level measure in Phase IV piezometer, stop pumping to Basin D.							,								
5,000 Gallon Tank at LTRF		7.33	2007	56.1 TV 21.7	3 73.04		age to	. 1			<del> </del>	<u> </u>		ļ	
Normal Operation.											<del> </del>	<del> </del>		ļ	
If level is greater than 11 feet, increase treatment, hauling, or recirculation.				-									_		
If level is less than 6 feet, decrease or stop hauling, recirculation.															<u> </u>
Effluent Pond					<b>网络</b>	51965Ch.,	11 × 34		-						
Normal Operation.															
If level is 6 inches or less, stop irrigation, recirculation, hauling.															
If level is greater than 4 feet, increase irrigation, recirculation, hauling.							· · · · · · · · · · · · · · · · · · ·								
Observed runoff of effluent to stormwater basins?	<del> </del>			14.10%	1.474	Saraja d	<del></del>			·					
No.			7												
If yes, contact supervisor immediately. Stop spray irrigation. Identify Basin and type.  Runoff Type  1 = Severe  2 = Moderate								- <b>s</b> -							
3 = Minor	1					· ·	•	•	ŀ		ļ				

Comments/Remedial Action:	•	•	•	
Prepared by Matthewa			·	

#### COMMISSION

DOTTIE BERGER PHYLLIS BUSANSKY JOE CHILLURA CHRIS HART JIM NORMAN **ED TURANCHIK** SANDRA WILSON

#### EXECUTIVE DIRECTOR

ROGER P. STEWART



ADMINISTRATIVE OFFICES, LEGAL & WATER MANAGEMENT DIVISION 1900 - 9TH AVENUE TAMPA, FLORIDA 33605 TELEPHONE (813) 272-5960 FAX (813) 272-5157

AIR MANAGEMENT DIVISION TELEPHONE (813) 272-5530

WASTE MANAGEMENT DIVISION TELEPHONE (813) 272-5788

WETLANDS MANAGEMENT DIVISION TELEPHONE (813) 272-7104

#### <u>MEMORANDUM</u>

D.E.P.

DEC 1 3 1995

DATE:

December 6, 1995

OCCIMIVEST DISTRICT **TAMPA** 

TO:

Richard Garrity, PhD., FDEP Southwest District

EPC/HC, Waste Management Division

THROUGH: Hooshand Boostani, P.E., Director, and Paul Schipfer, Assistant Director,

JII

FROM:

Chuck Heintz, Hydrologist, EPC/HC, Waste Management Division

SUBJECT: LEACHATE MANAGEMENT ISSUES WORKSHOP (NOVEMBER 28,

1995)

Environmental Protection Commission (EPC) staff wish to thank you and your agency for inviting us to attend the Leachate Management Issues Workshop. Twelve (12) counties and two (2) private companies were in attendance at this informative workshop.

EPC staff commends Mr. Kim Ford, P.E., for the professionalism and leadership that he exhibited in chairing the workshop.

After attending this workshop, permittees should be better able to manage the leachate control systems at their facilities. Such a workshop is a good example of your agency's partnership with the community.

cjh/drc

XC:

Bill Kutash, FDEP Southwest District Bob Butera, FDEP Southwest District Kim Ford, P.E., FDEP Southwest District Name

Name Bob Gardner (SCS Engineers)
Name Bob Gardner (SCS Engineers)  County Representing Hills bevough County
Department
(1) Was the length of time of the workshop appropriate for the subject matter covered?
yes - 1/2 day is appropriate
(2) If too long or too short, what length of time do you think would have been adequate to cover the material? What length of time would you like future workshops to be?
(3) Do you believe the information received will be helpful to you for future leachate management at your facility?
y = 5
(4) Do you feel your questions were responded to appropriately?
yes- although the appeared to be some reluctions by some parties to share exomity because of processed reactions by following parties to share exomity record reactions by following parties to share exomity record reactions by following parties and expension scheduled on various solid waste issues such as permitting, groundwater monitoring, cost estimates and other landfill operational procedures? Please suggest topics of interest.
I'm not sure which issue would be best. I think the FOEP should askes when its having to most difficulties with worth countries and focus on the problems
(6) If your response to (5) was yes, should sessions for small or intermediate size counties be separate from sessions with the larger counties?
$N_0$ .
(7) How often should any future sessions be scheduled? Check one:
Quarterly Semi-annually Annually
Other What timeframe?



## Department of Environmental Protection

Lawton Chiles Governor Southwest District 3804 Coconut Palm Drive Tampa, Florida 33619

Virginia B. Wetherell Secretary

DEC 1 2 1995

Ms. Patricia Berry, Hillsborough County Solid Waste Management P. O. Box 1110 Tampa,, FL 33601

Re:

Survey Request on Nov. 28th, 1995 Inter-governmental Meeting on Leachate Management

Dear Ms. Berry:

The Florida Department of Environmental Protection's Southwest District Solid Waste Section thanks you for attending the inter-governmental sharing meeting on Leachate Management on Tuesday, November 28, 1995. Due to unexpected personal reasons I was not able to attend but I have listened to the recordings of the session and have been updated by staff. The workshop appears to have been a success but I would like to get your input on the merits and shortcomings of this meeting and your ideas for sessions the Solid Waste Section may schedule in the future.

Attached is a survey that I would appreciate you responding to and forwarding to my attention by December 31, 1995. Signing of the survey is optional. This information will be helpful for planning purposes of any future workshops. The Solid Waste Section is always available for any questions you may have relating to the Solid Waste Regulations or technical guidance.

All members of the Solid Waste staff sincerely thank you for your time and participation at the November 28th meeting. If you have any other questions or comments you may contact me at (813) 744-6100, Ext. 451.

Sincerely,

Robert J. Butera, P.E. Solid Waste Manager

Southwest District

Attachment

cc:

Kim Ford, P.E.

Bob Gardner, SCS Engineers Larry Ruiz, SCS Engineers

"Protect, Conserve and Manage Florida's Environment and Natural Resources"

Printed on recycled paper.

### FAX COVER

TO:

DATE:

November 10, 1995

NAME:

Kim Ford

**ORGANIZATION:** 

**FDEP** 

**FAX NUMBER:** 

813/744-6125

PHONE NUMBER:

813/744-6100

**Environmental Consultants** 

3012 U.S. Highway 301 North Suite 700

Tampa, Florida 33619

ENGINEERS

Phone 813 621-0080 FAX 813 623-6757

FROM:

Larry Ruiz

JOB NUMBER:

0995029.11

NUMBER OF PAGES:

4

**COMMENTS:** 

#### 1995 YEAR TO DATE LEACHATE BALANCE SUMMARY SOUTHEAST COUNTY LANDFILL HILLSBOROUGH COUNTY, FLORIDA

		Leachate Arriving at LTRF		Leachate/Effi	ent Leaving LTF	RF		Inflow/Out	flow Balance F	or LTRF
	Rainfa[	Leachate Pumped to LTRF	Total Leach. Hauled From LTRF	Total Eff. Hauled	Leachate Rec. From LTRF	Effluent Rec.	Effluent Sprayed	Total Inflow	Total Outflow	Balance For Month
Month	(in.)	(Dsl.)	(gal.)	(gal.)	(gal.)	igal.)	{gal.}	(gal.)	(gal.)	(gal.)
Jan	4.60	3,104,000	3,166,000	(1) 0	0 :	_ 0	0	3,104,000	3,188,000	(62,000)
Feb	2.40	4,063,000	2,942,000	<u>{1}</u> 0	0	0	650,000	4,063,000	4,062,000	1,000
March	1.90	3,467,000	2,320,000	{1} O	0	113,000	932,000	3,467,000	3,705,000	(238,000)
April	1.60	2,625,000	1,124,000	393,000	60,000	0	700,000	2,625,000	2,528,000	97,000
May	2.40	2,331,000	865,725	652,689	O	0	1,000,270	2,331,000	2,255,439	75,561
June	8.30	2,369,000	904,543	758,000	O	0	568,520	2,369,000	2,252,277	116,723
July	17.90	2,296,000	845,087	1,185,000	0	0	319,750	2,298,000	2,236,821	59,179
August	15.80	2,940,000	1,620,842	1,050,000	0	0	398,520	2,940,000	2,997,072	(57,072)
Saptember	8.80	2,939,000	1,696,897	783,000	0	25,500	507,500	2,939,000	3,168,909	(229,909)
October	5.4D	3,130,000	972,984	865,000	0	76,500	600,480	3,130,000	2.763,129	366,871
YTD Total	69,10	29,264,000	16,458,078	5,686,689	60,000	215,000	5,677,040	29,264,000	29,134,647	129,353

#### Notes:

- Effluent quantities not measured separately.
   If the effluent bypass is ever used to pump effluent back to the LTRF, this table must be modified.

#### LEACHATE WATER BALANCE REPORT FORM October 1995

SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

•								SAST COUNTY		1	-						
				!-	IV	<u>v</u>	<u>VI</u>	VII	VIII	וא	Х	XI.	XH	XIII	XIV	ΧV	XVI
	1	4		ł		Est. Depth		Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Total	
	1	Ares	j	L	Effluent	Over	Landfil	Pumped	in 500K	reated	Leachate	Flecir-	Pond	Effluent	Recir-	Effluent	Landfill
Dav	E	(BCres		Rainfall	Pond	iner	Storage	to LTRF	Tenk	at LTRF	Haulad	culation	Storage	Sprayed	culation	Hauled	Evapor.
Day 1	final	active	int.	lin.l	(in.)	(in.)		(gal.)	igal )	(gal.)	Igal.J	(gal.)	(gal.)	(, lep)	igel.)	(gai.)	(gal.)
	23.2	5.0	92.2	0.0		NR	NA	69,000	216,000	55,040	0		NR	0	0	0	0
	23.2	5.0	92.2	0.0				132,000	230,000	55,100	62,047	0	75,000	42,900	17000	18,000	48,000
- 3	23.2	5.0	92.2	0.1				83,000	202,000	55,305	66,928	0	75,000	42,900	0	18,000	35,000
4	23.2	5.0	92.2	0.6				68,000	202,000	55,200	12,431	0	81,000	0	0	000,88	
<u> </u>	23.2	5.0	92.2	0.2	25.0			125,000	259,000	55,405	12,295	0	78,000	0	0	62,000	
<u> </u>	23.2	5.0	92.2	1,8	26.0			61,000	259,000	54,820	6,000	0	81,000	0	0	74,000	· · · · ·
<u> </u>	23.2	5,0	92.2	1.0			1 2 1 2 2 2 2 2	84,000	288,000	55,630	C	0	78,000	0	0	37,000	0
8	23.2	5.0	92.2	0.0		NR	NR	NR	NR	54,920	О		NR	. 0	0	0	0
9		5.0	92.2	0.0	28.0	59.0		230,000	345,000	55,170	62,478	0	88,000	42,900	0	12,000	35,000
10		5.0	92.2	0.5	29.0	59.0		45,000	317,000	55,230	18,500	0	92,000	0	0	61,000	0
11		5.0	92.2	0.4	30.0	59.0		171,000	345,000	55,320	87,351	0	95,000	42,900	0	12,000	35,000
12		5.0	92.2	0.0	27.0	59.0		70,000	202,000	<b>55,27</b> 5	67,786	0	85,000	40,600	0	8,000	33,000
13		5.0	92.2	0.0	28.0	59.0		142,000	202,000	55,230	86,467	0	88,000	20,400	0	6,000	18,000
14		5.0	92.2	0.2	28.0			33,000	173,000	55,620	8,200	0	88,000	0	8500	74,000	7,000
15		5.0	92.2	0.0	_	NR	NR	NR	NR	59,970	0		FN	0	0	O	0
16		5.0	92.2	0.0	24.0			314,000	288,000	60,060	78,738	0	75,000	37,110	8500	12,000	37,000
17		5.0	92.2	0.0	27.0	59.0		70,000	173,000	60,370	0	0	85,000	0	0	38,000	0
18		5.0	92.2	0.0	30,0	59.0		128,000	230,000	52,850	17,200	0	95,000	0	8500	74,000	7,000
19		5.0	92.2	0.6	28.0	59.0	10,112,000	60,000	230,000	60,340	0	0	88,000	0	0	37,000	0
20		5.0	92.2	0.0	28.0		10,576,000	127,000	230,000	60,030	87,167	0	88,000	42,170	8500	19,000	41,000
21		5.0	92.2	0.0	24.0			31,000	202,000	60,110	0	0	75,000	0	0	56,000	0
22		6.0	92.2	0.0		NR	NR	NR	NR	59,640	0	0	N8	Ō	0	0	0
23		5.0	92.2	D.O	28.0	59.0		374,000	374,000	50,190	80,732	0	89,000	42,900	0	12,000	35,000
24		5.0	92.2	0.0	27.0	57.0		70,600	202,000	60,020	31,048	0	85,000	37,600	0	25,000	30,000
25		5.0	82.2	0.0	20.0	58.0		88,000	173,900	60,260	55,146	0	61,000	42,900	8500	25,000	42,000
26		5.0	92.2	0.0	27.0	57.0		118,000	173,000	59,720	55,983	0	85,000	42,000	0	19,000	34,000
27	23.2	5.0	92.2	0.0	24.0	56.0		50,000	144,600	60,080	18,897	0	75,000	36,000	0	25,000	29,000
28		5.0	92.2	0.0	24.0	59.0	10,112,000	63,000	144,600	62,900	0	0	75,000	0	0	31,000	0
29		5.0	92.2	3.0		NR	NR	NA	NR	59,480	0	0	N/R	0	0	0	0
30		5.0	92.2	0,0	32.0	58.0	9,649,000	260,000	230,000	60,490	53,809	0	102,000	42,900	8500	25,000	42,000
31	23.2	5.0	92.2	0.0	30.0	58.0	9,649,000	58,000	173,000	60,170	24,981	0	95,000	44,300	8500	19,000	43,000
		I								-							
Total				5 40	693.0	1531.0	201,525,000	3,130,000	6,206,000	1,790,145	972,984	0	2,176,000	600,480	76,500	885,000	549.000
Average				0.17	26.7	58.9		101,000	200,000	58,000	46,000	Ö	84,000	40,000	10,000	33,000	32,000
																32 Revised by RL	

#### Notes:

- 1. NR = No Records.
- 2. Column II, total area with waste is 120.4 acres (Phases I-IV).
- 3. Columns III and IV, field measured. Column III, Trace is less than 0.01 inches and is not included in total.
- 4. Column V, estimated from depth in Phase IV Plezometer.
- 5. Column VI, estimated from Column V and approximate volume with top of clay elevation at 117.0 feet.
- 8. Column VII, calculated from Column IX + Column X + Change in Storage of 500,000 gal. tank.
- 7. Column VIII, calculated from depth in 500,000 gal. leachate tank.
- Columns IX and XIII, quantities from flow meters.
   Columns X, XI, XIV, and XV, quantities calculated from truck weight.
- 10. Column XVI, 80.8% of the daily values from Columns XI, XIII and XIV.
- 11. Values in italic are substitute for missing data and are based on averaged values.

10-958AL WB2 Revised by RLC 11/8/95

### FIBLD DATA ENTRY FORM

October 1995
SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

		1				JTHEAST CO					•					
	A asia a d	111	IV	<u> </u>	VI	VII	VII	IX_	X	XI	XII	XIII	XIV	XV	XVI	XVII
ì	Active	Depth in	Stormwater	Phase III	Phase IV	Phase IV		Leachate		Leachate	Effluent	Hauled	Effluent	Leachate	Effluent	Depth in
			in Sump No. 4		Riser	Piezometer		Contractor	Courry	Recirc.	Contractor	Courty	Recirc.			500K Tank
Day	(ac.)	(in.)	{in.}	{in.i	Į įn.i	(in.)	{in.}	gal.}	(_lag)	(gal.i	(gel.)	(gal.)	(gal.)	LTRF (gal.	(gal.)	(f1.)
<u> </u>	5.0		NR			NR	0.0					0.0				7.6
<del>                                    </del>	5.0	24.0				59.0					18400.0	0.0	17000.0	55100.0	4290C.C	0.8
3	5.0	24.0				60.0		49484.0		0.0			0.0	55305.0	42900.C	7.0
4	5.0	26.0			16.0	61.0	0.6	6134.0		0.0	67931.0	0.0	0.0			7.0
5	5.0	25,0	1111	3.0	15.0	60.0		12295.0				0.0	0.0			8.0
6	5.0	26,0		4.0	15.0	60.0	1.8	0.0	6000.0	0.0	74332.0	0.0	0.0	54820.0	0.0	9.0
7	5.0	25.0		6.0		60.0	1.0		0.0	0.0	36744.0	0.0	0.0	55630.0	0.0	10.0
8	5.0					NR	0.0	0.0	0.0	0.0	0.0	0.0	0.0			NR
9	5.0	28.0					0.0	62478.0	0.0	0.0	12222.0	0.0	0.0	55170.0	42900.C	12.0
10	5.0	29.0	71.0			59.0	0.5	18500.0	0.0	0.0	61386.0	0.0	0.0			11.0
11	5.0	30.D		7.0		59.0	0.4	68329.0	19022.0	0,0	12206.0	0.0	0,0	55320.0	42900.C	12.0
12	5.0	27.0	69.0			59.0	0.0	67786.0	0,0	0.0	6100.0	0.0	0,0		40600.d	7.0
13	5.0	28,0	70.0		14.0	59,0	0.0	73932.0	12535.0	0.0	6100.0	0.0	0.0	55230.0	20400.0	7.0
14	5.0	28.0	70.0		16.0		0.2	6200.0	0.0	0.0	73928.0	0.0	8600.0			6.0
15	5.0					NR	0.0	0.0	0.0	0.0		0.0	0.0	59970.0	0.0	NR
16	5.0	24.0	70.0			59.0	0.0	62038.0	16700.0	0.0	12300.0	0.0	8500.0		37110.0	10.0
17	5.0	27.0		7.0		59.0	0.0	0.0	0.0	0.0	37525.0	0.0	0.0	60370.0	0.0	6.0
18	5.0	30.0	70.0	6.0	17,0	59,0	0.0	0.0	17200.0	0.0	74136.0	0.0	8500.0	52850.0	0.0	8.0
19	5.0	28.0		5.0	16.0	59.0	0.6	0.0	0.0	0.0	37409.0	0.0	0.0	60340.0	Q.Q	8.0
20	5.0	28.0	71.0			0.03	0,0	55667.0	11500.0	0.0	18612.0	0.0	8600.0	60030.0	42170.Q	8.0
21	Б.О	24.0	71.0		15.0	59.0	0,0	0.0	0.0	0.0	55734.0	0.0	0,0	60110.0	0.0	
22	5.0				NR	NR	0.0	0.0	0.0	0.0	0.0	0.0	0.0	59840.0	0.0	NR
23	5.0	28.0	69.0		15.0	59.D	0.0	61846.0	18886.0	0.0	12300.0	0.0	0.0	60190.0	42900.0	13.0
24	5.0	27.0	68.0		18.0	67.D	0.0	31048.0	0.0	0.0	24829.0	0.0	0.0	60020.0	37600.0	
25	5.0	20.0	69.0		16.0	58.0	0.0	37167.0	18979.0	0.0	24600.0	0.0	8500.0		42900.0	5.0
26	5.0	27.0	69.0		16.0	57.0	0.0	43330.0	12653.0	0.0	18500.0	0.0	0.0		42000.0	6.0
27	5.0	24.0	60.0		15.0	56.0	0.0	12340.0	6357.0	0.0	24673.0	0.0	0.0		36000.0	
28	5.0	24.0	70.0	3.0	9.0	59,0	5.0	0.0	0.0	0.0		0.0	0.0			
29	5.0		NR	NR	NR	NR	0.0	0.0	0.0	0.0		0.0	0.0		0.0.	
30	5.0	32.0	68.0	5.0	16.0	58.0	0.0	37309.0	16500.0	0.0	24858.C	0.0	_		42900.0	
31	5.0	30.0	59.0	4.0	17.0	58.0	0.0	24981.0	0.0	0.0		0.0	8500.0		44300.0	6.0
<u></u>																
									<del></del>							

#### Notes:

- 1. NR = No Records.
- Columns II-VIII, field measured. Column VIII, Trace is less than 0.01 inches.
   Column VI, if level exceeds 24 inches, leachate withdrawal from landfill must increase.
   Column VII, Phase IV piszometer began moritoring on 7/10/95.
   Columns IX-XIV, quantities calculated from truck weight.
   Columns XV and XVI, quantities from flow meters.

- 7. Column XVII, field measured.
  8. Values in italic are substitute for missing data and are based on averaged values.



## Department of Environmental Protection

Lawton Chiles Governor Southwest District 3804 Coconut Palm Drive Tampa, Florida 33619

Virginia B. Wetherell Secretary

Ms. Patricia Berry Hillsborough County Solid Waste Management P. O. Box 1110 Tampa, FL 33601

NOV \_ 9 1995

Re:

November 28, 1995 Intergovernmental Meeting to Discuss Leachate

Management Issues

Dear Ms. Berry:

The Florida Department of Environmental Protection Southwest District Solid Waste Section would like to invite you to attend an intergovernmental information sharing meeting, discussing the issues of Leachate Quantity Reports submittals and current available off-site leachate disposal options.

The meeting will be held on Tuesday, November 28, 1995, from 10:00 A.M. to 2:30 P.M., at the Department's Southwest District office in Tampa.

This meeting will allow you a forum to freely discuss any questions you may have in regard to and identify ways you can use the reported leachate quantity data and will allow for an exchange of information on off-site leachate disposal options available and currently used. Attached is a summary of data reported this year, for your review.

#### AGENDA

Leachate Quantity Reports (formats and uses) 10:00 - 11:30 A.M.

Off-site Leachate Disposal (options and limitations) 11:30 A.M. - 12:30 P.M.

Lunch Presentation (Hillsborough County Southeast Landfill) 12:30 - 1:30 P.M.

Wrap-up and Questions 1:30 - 2:30 P.M.

Lunch delivery will be available at a cost of \$3.50 per person to include a sandwich, chips, and a soft drink, or you may bring your own lunch. There will be space available in the meeting room to allow up to 3 persons per facility to attend. The Department suggests that at least one individual who is directly responsible for leachate management at the facility attend the meeting. Counties may choose to invite their consultant if they are responsible for compiling leachate data for the landfill.

You are requested to contact me at (813) 744-6100, ext. 382, prior to November 22, 1995, confirming who from your organization will be attending the meeting or if you have any questions.

Sincerely,

Kim B. Ford, P.E.

Solid Waste Section

Division of Waste Management

KBF/ab Attachment

cc: Robert Butera, P.E., FDEP Tampa

Susan Pelz, FDEP Tampa Matt Mathews, HCDSW Daryl Smith, HCDSW Paul Schipfer, HCEPC

#### LEACHATE MANAGEMENT IN S.W. DISTRICT

Facility	Rainfall	# Days	Open Acres	Interm. Acres	Closed Acres	Collected	Leachate gal/acre/day	From	To
Citrus 7 Ac	27.2	180	0	0	7	206,595	164	1-Jan-95	30-Jun-95
Citrus Ex. Phs I	27.2	180	3	14	0	942,907	308	1-Jan-95	30-Jun-95
Desoto	33.2	180	4	4	0	1,609,268	1118	1-Jan-95	30-Jun-95
Hardee	24.3	180	9	5	0	3,995,220	1585	1-Jan-95	30-Jun-95
Hernando Croom	24.1	180	0	0	5	63,800	71	1-Jan-95	30-Jun-95
Hernando NW	34.0	180	6	0	0	1,533,300	1420	1-Jan-95	30-Jun-95
Hills DJJ	11.6	180	1	5	0	1,003,709	929	1-Jan-95	30-Jun-95
Hills. SE	21.2	180	5	92	23	17,872,000	827	1-Jan-95	30-Jun-95
Levy Area #1	38.0	180	0	3	0	160,490	297	1-Jan-95	30-Jun-95
Levy Area #2	38.0	180	3	0	0	996,125	1845	1-Jan-95	30-Jun-95
Levy Pond	38.0	180	1	0	0	1,031,791	5732	1-Jan-95	30-Jun-95
Manatee Stg I	17.5	180	6	113	0	52,495,162	2451	1-Jan-95	30-Jun-95
Manatee Stg III	17.5	180	0	71	0	21,517,427	1684	1-Jan-95	30-Jun-95
Manatee Pond	17.5	180	5	0	0	2,375,835	2640	1-Jan-95	30-Jun-95
Pasco East T1	20.3	180	0	0	7	99,800	79	1-Jan-95	30-Jun-95
Pasco East T2	20.3	180	0	0	7	129,600	103	1-Jan-95	30-Jun-95
Pasco East T3	20.3	180	0	0	5	7,000	8	1-Jan-95	30-Jun-95
Pasco East T4	20.3	180	0	. 6	5	36,000	18	1-Jan-95	30-Jun-95
Pasco East T5	20.3	180	2	4	0	680,800	630	1-Jan-95	30-Jun-95
Pasco West A1	26.9	180	8	0	0	3,130,029	2174	1-Jan-95	30-Jun-95
Pasco West Cls III	26.9	180	7	0	0	2,313,350	1836	1-Jan-95	30-Jun-95
Pin. 126th Ave.		180	12	0	0	0	0	1-Jan-95	30-Jun-95
Pin. Bridgeway Ac.	26.6	180	750	0	0	147,580,564	1093	1-Jan-95	30-Jun-95
Pin. Toytown	20.0	180	0	0	215	21,345,510	552	1-Jan-95	30-Jun-95
Polk NC	23.1	180	6	40	0	617,500	75	1-Jan-95	30-Jun-95
Polk NE	18.8	180	0	14	0	1,253,953	498	1-Jan-95	30-Jun-95
Polk SE	20.8	180	4	14	0	3,034,152	936	1-Jan-95	30-Jun-95
Sarasota B. R.	23.7	180	15	115	90	27,276,228	689	1-Jan-95	30-Jun-95

### LEACHATE MANAGEMENT IN S.W. DISTRICT

Facility	Rainfall	# Days	Open Acres		Closed Acres		Leachate	_	
Citrus 7 Ac	27.2	92	0	AGI &	ACIES 7	Collected 67,022	gal/acre/day	From	To
Citrus Ex. Phs I	27.2	92	3	14	0	597,023	104	1-Jul-95	30-Sep-95
Desoto	37.3	92	4	4	0		382	1-Jul-95	30-Sep-95
Hardee	31.7	92	9	5	0	2,316,000		1-Jul-95	30-Sep-95
Hernando Croom	23.8	92	0	0	5	2,794,569	2170	1-Jul-95	30-Sep-95
Hernando NW	18.5	92	6	0	0	23,200	50	1-Jul-95	30-Sep-95
Hills DJJ	14.9	92	1	5	0	1,251,600	2267	1-Jul-95	30-Sep-95
Hills. SE -	42.5	92	·5	92	23	388,200	703	1-Jul-95	30-Sep-95
Levy Area #1	19.6	92	0	3	0	8,175,000 129,173	740	1-Jul-95	30-Sep-95
Levy Area #2	19.6	92	3	0	0	623,850	468	1-Jul-95	30-Sep-95
Levy Pond	19.6	92	1	0	0		2260		30-Sep-95
Manatee Stg I	34.0	92	6	113		532,187	5785	1-Jul-95	30-Sep-95
Manatee Stg III	34.0	92	0	71	0	32,856,807	3001	1-Jul-95	30-Sep-95
Manatee Pond	34.0	92	5	0	0	14,388,424	2203	1-Jul-95	30-Sep-95
Pasco East T1	32.4	92	0	0	0 7	4,615,908	10035	1-Jul-95	30-Sep-95
Pasco East T2	32.4	92	0	0	7	80,800	125	1-Jul-95	30-Sep-95
Pasco East T3	32.4	92	0	0		138,550	215	1-Jul-95	30-Sep-95
Pasco East T4	32.4	92	0	6	5	15,100	33	1-Jul-95	30-Sep-95
Pasco East T5	32.4	92			5	39,900	39	1-Jul-95	30-Sep-95
Pasco West A1	20.5		2	4	0	704,908	1277	1-Jul-95	30-Sep-95
Pasco West Cis III		92	8	0	0	1,703,959	2315	1-Jul-95	30-Sep-95
Pin. 126th Ave.	26.3	92	7	0	0	2,188,300	3398	1-Jul-95	30-Sep-95
<del></del>		92	12	0	0	0	0	1-Jul-95	30-Sep-95
Pin. Bridgeway Ac.	20.4	92	750	0	0	0	0	1-Jul-95	30-Sep-95
Pin. Toytown	26.4	92	0	0	215	10,987,910	556	1-Jul-95	30-Sep-95
Polk NC	27.8	92	6	40	0	408,013	96	1-Jul-95	30-Sep-95
Polk NE	31.8	92	0	14	0	728,755	566	1-Jul-95	30-Sep-95
Polk SE	25.5	92	4	14	0	2,582,884	1560	1-Jul-95	30-Sep-95
Sarasota B. R.	36.5	92	15	115	90	15,654,008	773	1-Jul-95	30-Sep-95



# Hillsborough County

Department of Solid Waste \* P.O. Box 1110 Tampa, FL 33601

Sender's Telephone Number: 276-2908

24-Hour FAX Line - (813) 276-2960



. 1 / - / -	
DATE: 1//9/95	"Together We CAN-DO It"
TO: Bob Butera, DEP, Solid	2 Waste
FAX: 744-6/25 SUBJECT: SELF -	Leachate Mant.
FROM: P.V. Berry, DSW	J -
COMMENTS (If Any): tim astead that I pro	stide you with an
update of the DSW's efforts at the	SELF. SS Engineer
have a glitch in the water Balance	e Computer program
so they will be forwarding to	he October o
November data to your office	tomorrow.
My hard copy to follow will 1	
pacteage of the data with it. He	
at the site rext weets. Put	En _
Total Pages Sent (including cover sheet	)

#### Serving our customers with:

Residential & Commercial Collection Services · Curbside Recycling · Resource Recovery
Household Chemical Collection · Adopt-A-Road & Adopt-A-Shore
Environmental Enforcement · Yard & Wood Waste Processing · Landfill Services
Community Collection Centers · Environmental Testing

### HILLSBOROUGH COUNTY

#### Florida

Office of the County Administrator
Daniel A. Kleman

BOARD OF COUNTY COMMISSIONERS
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Phyllis Busansky
Joe Chillura
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Jim Norman
Ed Turanchilk
Sandra Helen Wilson



November 9, 1995

Senior Assistant County Administrator Patricia Bean

Assistant County Administrators
Edwin Hunzeker
Crests Johnson
Jimmie Keel
Robert Taylox

Mr. Kim Ford, P.E.
Solid Waste Permitting
Florida Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

RE: Southeast County Landfill - Leachate Management

Dear Mr. Ford:

In accordance with the Hillsborough County Department of Solid Waste's (DSW) Leachate Management Plan for the Southeast County Landfill (Landfill), the DSW is providing the Landfill's Water Balance Report Form for the month of October 1995. In addition, the DSW is providing the October 1995 field data forms for the Landfill, the daily leachate and collection system evaluation reports, the treatment plant operator's form, and the Year-to-Date Leachate Balance Summary. As requested during our recent telephone conversation, the DSW is also providing the hand written data through November 8, 1995.

This information is being provided to the Florida Department of Environmental Protection (DEP) and the Hillsborough County Environmental Protection Commission as an update on the DSW's leachate management efforts for the Landfill. This information is being provided in response to both the permitting and enforcement issues at hand.

As indicated on the Temporary Pump Station No. 5 drawings, the DSW intends to install a pump control well to include electrodes with cables to connect to the control panel for the new pump. The pump control well will be utilized to automate Temporary Pump Station No. 5 and allow it to cycle based on leachate flow rates. This well and controls will be utilized with the new pump and instrinsically safe control relay which are being purchased for Temporary Pump Station No. 5. Although the pump and control relay have not yet been purchased (as discussed in my November 1, 1995 letter), the DSW is proceeding with the construction of the pump control well. It is anticipated that the well construction will be scheduled for next Wednesday or Thursday, November 15 or 16, 1995. The DSW is inviting the DEP to visit the Landfill and observe the installation of this well and meet with the DSW and SCS Engineers to discuss the status of the County's leachate management efforts. Once a firm date and time is scheduled, the DSW will notify the DEP.

Mr. Kim Ford November 9, 1995 Page Two

To clarify the DSW's November 1, 1995 correspondence referencing pumping limitations, the DSW offers the following information.

While the DSW has been working to purchase the pump and control panel designated for the Temporary Pump Station No. 5, the DSW has been utilizing pumps from the DSW's and County's pump inventory. During this process, several pumps have broken down, requiring the DSW to substitute pumps while the other pump was in the shop. However, even with the pump problems, the DSW has been pumping from Temporary Pump Station No. 5, in addition to continuing to pump from Pump Station No 3. Since the current system is not automated, Temporary Pump Station No. 5 is only being operated during daylight hours. However, Pump Station No. 3 operates around the clock removing leachate from the Landfill. As indicated in the DSW's November 1, 1995 letter, the DSW most recently attached a six inch pump to the system anticipating that the pump would be able to run continuously at an idle speed. However, due to the leachate flow rate within the collection system, the pump is also cycling and is unable to run 24 hours a day without being manned. The limitation referenced in the DSW's November 1, 1995 correspondence pertains to hours of pumping and pump breakdowns. With the installation of the new pump, control panel and pump control well, the system will be fully automated and will be able to operate 24 hours a day thereby removing leachate at a more constant rate.

Should the DEP have any other questions at this time, please advise. The DSW will notify the DEP of the upcoming well construction date once it is finalized.

Sincerely,

Patricia V. Berry

Landfill Services Section Manager

Department of Solid Waste

#### Attachments

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

### HILL BOROUGH COUNTY

#### Florida

Office of the County Administrator
Daniel A. Kleman

BOARD OF COUNTY COMMISSIONERS

Dottie Berger
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Joe Chillura
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lim Norman

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Sandra Helen Wilson



Senior Assistant County Administrator Patricia Bean

Assistant County Administrators Edwin Hunzeker Cretta Johnson Jimmie Keel Robert Taylor

November 1, 1995

Mr. Kim Ford, P.E. Solid Waste Permitting Florida Department of Environmental Protection 3804 Coconut Palm Drive Tampa, Florida 33619 NOV 0 3 1995

Departs SOUTHWEST DISTRICT

BY

RE: Southeast County Landfill - Leachate Management

Dear Mr. Ford:

In accordance with the Hillsborough County Department of Solid Waste's (DSW) Leachate Management Plan for the Southeast County Landfill (Landfill), the DSW is providing the Landfill's Water Balance Report Form for the month of September 1995. In addition, the DSW is providing the September 1995 field data forms for the Landfill, the daily leachate and collection system evaluation reports, and the treatment plant operator's form. The DSW is also providing the Year-to-Date Leachate Balance Summary.

This information is being provided to the Florida Department of Environmental Protection (DEP) and the Hillsborough County Environmental Protection Commission as an update on the DSW's leachate management efforts for the Landfill. This information is being provided in response to both the permitting and enforcement issues at hand.

In addition, the DSW is notifying the DEP that the purchase of the permanent pump for Temporary Pump Station No. V in Phase IV has been temporarily delayed due to problems in procurement of the specified equipment. In response to the County's bid advertisement to purchase the pump, no bids were received. The County's Purchasing Department is again attempting to seek bids. In the interim, however, the DSW is relocating the larger six inch pump from Phases V and VI to Pump Station No. V. The DSW will attempt to modify the pump with fittings and reducers to be able to connect to the four inch leachate line. Unfortunately, because of the pumping limitations during the past few months, it appears that the leachate level in the Phase IV piezometer has not yet been affected. If the connection of the six inch pump is successful, the DSW should be able to run this pump on continuous idle, resulting in greater leachate removal from Phase IV.

Mr. Kim Ford November 1, 1995 Page Two

In addition, the Daily Leachate Collection and Recovery System Evaluation Report references that a header pipe broke resulting in a minor spray irrigation discharge on October 21, 1995. The DSW is providing the following information to explain the comment.

On September 21, 1995, an effluent irrigation lateral was damaged from landfilling activities resulting in a minor effluent discharge to land surface. Upon observing the damage to the lateral pipe, an employee immediately shut the irrigation system down and isolated the break from the active irrigation system. The leak duration was a few minutes.

The damage to the lateral pipe occurred on the west end of Phase I which is currently being landfilled. Approximately 200 gallons of effluent was discharged over the lined area of the landfill, with a portion of the effluent infiltrating into the cover soils of the landfill. A portion of the effluent also entered stormwater Basin A and infiltrated into the basin before it could be recovered.

The damaged lateral is still disconnected from the active spray irrigation system and will be repaired once landfilling activities in the surrounding area are completed.

Unfortunately, since the DSW administrative staff and SCS Engineers were only recently informed of the incident, the DSW was unable to report the incident to the DEP any earlier. The DSW has implemented internal procedures to ensure that landfill employees provide more timely notification of such incidents.

Regardless, the DSW intends to sample the surface and groundwater total dissolved solids (TDS) concentrations in the immediate vicinity of Basin A to determine any possible impact from the effluent discharge to either the surrounding surface or groundwater. The TDS is being evaluated since the effluent analysis indicates that TDS, of which chloride is the main component, is of concern with regard to possible impact on water quality.

The DSW proposes to collect samples from monitoring well TH-26 and from the surface water adjacent to Basin A. A groundwater sample will immediately be collected from TH-26, followed by the regular quarterly sampling event scheduled for mid-November. The surface water entering the tributary adjacent to Basin A will also be sampled immediately for TDS. Depending on results of the sampling, further assessment may or may not be necessary. The DSW will provide the DEP a copy of the analysis once it is available.

Mr. Kim Ford November 1, 1995 Page Three

Should you have any questions concerning the information provided, please call at 276-2908.

Sincerely,

Fatricia V. Berry

Landfill Services Section Manager

Department of Solid Waste

#### Attachments

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

#### LEACHATE WATER BALANCE REPORT FORM SEPTEMBER 1995

#### SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

		- 11		111	IV	V	VI	VII	VIII	IX	X	XI_	. XII	XIII	XIV	ΧV	XVI
							1	Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Total	
		Area			Effluent	Over	Landfill	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir-	Effluent	Landfill
_		(acres)		Rainfall		Liner	Storage	to LTRF	Tank	at LTRF	Hauled	culation	Storage	Sprayed	culation	Hauled	Evapor.
Day	final	active	int.	(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)
1	23.2	5.0	92.2	0.3				69,000	345,000	45,495	80,727	0	58,000	0	0	25,000	0
2	23.2	5.0	92.2	0.4				185,000	374,000	45,680	110,960	0		0	0	19,000	0
3	23.2	5.0	92.2				NR	NR	NR	45,320	0	0	NR	0	0		0
4	23.2	5.0	92.2				NR	NR	NR	44,895	134,300	0	NR	0	ō	0	ō
5	23.2	5.0	92.2	2.2			9,649,000	207,000	288,000	45,405	23,603	0	55,000	0	0	43,000	0
8	23.2	5.0	92.2	0.4			11,503,000	94,000	259,000	43,900	78,748	0	58,000	0	Ö	49,000	Ö
7	23.2	5.0	92.2	0.1			10,578,000	118,000	259,000	45,055	72,678	0	71,000	32,500	ŏ	50,000	28,000
. 8	23.2	5.0	92.2	0.3	21.0			165,000	259,000	44,428	120,830	0	65,000	45,200	Ö	12,000	37,000
9	23.2	5.0	92.2	0.4	21.0			57,000	230,000	43,800	42,101	0	65,000	0	ő	31,000	37,000
10	23.2	5.0	92.2				NR	NR	NR	46,880	0		NR	Ö	0	31,000	
11	23.2	5.0	92.2	1.3	38.0	61.0	11,039,000	198,000	317,000	46,053	18,300	0	124,000	0	Ö	62,000	
12	23.2	5.0	92.2	0.8	27.0	60.0	10,576,000	109,000	374,000	45,225	8,227	0	85,000	0	0	68,000	0
13	23.2	5.0	92.2	0.2	27.0	59.0	10,112,000	161,000	403,000	45,340	86,633	ō	85,000	0	0	25,000	
14	23.2	5.0	92.2	0.0	13.0	59.0	10,112,000	4,000	288,000	50,745	68.836	. 0	39,000	45,200	0	12,000	37,000
15	23.2	5.0	92.2	0.0	16.0	59.0	10,112,000	227,000	345,000	51,070	118,101	ō	49,000	45,200	0	12,000	37,000
16	23.2	5.0	92.2	0.0	19.0	59.0	10,112,000	82,000	259,000	50,356	117,709	Ö	58,000	0	0	12,000	37,000
17	23.2	5.0	92.2	0.0	NR	NR	NR	NR	NR	50,410	0		NR	0	0	0	0
18	23.2	5.0	92.2	0.0	30.0	60.0	10,578,000	186,000	259,000	50,530	85,092	Ö	95,000	42,700	0	43,000	35,000
19	23.2	5.0	92.2	0.2	22.0	59.0		97,000	202,000	50,445	104,382	0	68,000	42,700	0	18,000	35,000
20	23.2	5.0	92.2	0.0	24.0	59.0	10,112,000	119,000	202,000	50,340	68,403	0	75,000	42,700	0	25,000	
21	23.2	5.0	92.2	0.0	15.0	58.0		98,000	173,000	50,520	74,458	0	45,000	42,700	0	18,000	35,000
22	23.2	5.0	92.2	0.0	25.0	59.0		72,000	144,000	50,380	49,949	ŏ	78,000	42,700	0	6,000	35,000
23	23.2	5.0	92.2	0.0		60.0		51,000	144,000	50,660	0	0	85,000	42,700	0		35,000
24	23.2	5.0	92.2	0.0	NR				NR	49,930	Ö		NR 85,000	0	8500	56,000	0
25	23.2	5.0	92.2	0.0		60.0		251,000	230,000	52,710	82,242	0	78,000	40,500		0	7,000
26	23.2	5.0	92.2	0.6	27.0	80.0		64,000	202,000	55,490	37.307	0	85,000		8500	25,000	40,000
27	23.2	5.0	92.2	0.2	32.0	59.0		152,000	230,000	55,350	68,245	0	102,000	42,700	0	31,000	0 000
28	23.2	5.0	92.2	0.0	20.0	60.0		54,000	173,000	55,540	55,770	0	61,000			12,000	35,000
29	23.2	5.0	92.2	0.9	27.0	59.0	10,112,000	37,000	144,000	54,560	11,518	0		42,700	8500	18,000	41,000
30	23.2	5.0	92.2	0.0	24.0	60.0		84,000	202,000	55,500	11,516	- 6	85,000	0	0	88,000	0
						55.0	. 5,5,5,5,500	04,000	202,000	33,300		- 0	75,000	0	0	43,000	0
		1		0.00	570.												
otal				8.80	578.0	1489.0	259,295,000			1,472,012		0	1,802,000	507,500	25,500	783,000	435,000
verage				0.29	23.1	59.6	10,372,000	98,000	210,000	49,000	71,000	0	72,000	42,000	9,000	31,000	33,000
lotes:											<del></del>				9-958AL.WB2	By LER, 10/	

#### Notes:

- 1. NR = No Records.
- 2. Column II, total area with waste is 120.4 acres (Phases I-IV).
- 3. Columns III and IV, field measured. Column III, Trace is less than 0.01 inches and is not included in total.
- 4. Column V, estimated from depth in Phase IV Piezometer.
- 5. Column VI, estimated from Column V and approximate volume with top of clay elevation at 117.0 feet.
- 6. Column VII, calculated from Column IX + Column X + Change in Storage of 500,000 gal. tank.
- 7. Column VIII, calculated from depth in 500,000 gal. leachate tank.
- 8. Columns IX and XIII, quantities from flow meters.
- 9. Columns X, XI, XIV, and XV, quantities calculated from truck weight.
- 10. Column XVI, 80.8% of the daily values from Columns XI, XIII and XIV.
- 11. Values in italic are substitute for missing data and are based on averaged values.



Department Chvironmental Protection SOUTHWEST DISTRICT

#### **BEST AVAILABLE COPY**

#### FIELD DATA ENTRY FORM SEPTEMBER 1995

#### SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

1	11	111	!V	V	VI	VII	VIII	IX	X	XI	XII	XIII	XIV	ΧV	XVI	XVII
	Active	Depth in	Stormwater	Phase III	Phase IV	Phase IV	,	Leachate		Leachate	Effluent		Effluent	Leachate	Effluent	Depth in
1 1	Area	Effl. Pond	In Sump No. 4		Riser	Piezometer	Rainfall	Contractor	County		Contractor	County	Recirc.	Treated at		500K Tank
Day	(ac.)	(in.)	(in.)	(in.)	(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	LTRF (gal.	, , ,	(ft.)
1	5.0	19.0	75.0	6.0	16.0		0.3	61900.0	18827.0			0.0				
2	5.0	19.0	76.0	5.0	16.0	59.0	0.4	85948.0	25012.0		18676.0	0.0			0.0	
3	5.0			NR	NR	NR	0.0	0.0	0.0	0.0	0.0	0.0				
4	5.0	NR	NR	NR	NR	NR	0.0	109500.0	24800.0	0.0	0.0	0.0				
- 5	5.0	18.0	81.0	7.0	18.0	68.0	2.2	18536.0	5067.0	0.0	43212.0	0.0				10.0
6	5.0	19.0	81.0			62.0	0.4	72729.0	6019.0	0.0	49370.0	0.0				9.0
7	5.0	23.0	80.0			60.0	0.1	72678.0	0.0	0.0	49661.0	0.0	0.0		32500.0	9.0
8	5.0	21.0	77.0				0.3	120630.0	0.0	0.0	12400.0	0.0	0.0	44427.5	45200.0	9.0
9	5.0	21.0	77.0				0.4	42101.0	0.0	0.0	31155.0	0.0	0.0	43800.0		
10	5.0		NR	NR	NR	NR	0.5	0.0	0.0	0.0		0.0	0.0	46880.0	0.0	
11	5.0	38.0	75.0				1.3	0.0	18300.0	0.0	61970.0	0.0	0.0	46052.5	0.0	11.0
12	5.0	27.0	77.0				0.8	6227.0	0.0	0.0	67948.0	0.0	0.0	45225.0	0.0	13.0
13	5.0	27.0	78.0				0.2	80288.0	6345.0	0.0	24515.0	0.0	0.0	45340.0	0.0	14.0
14	5.0	13.0	78.0		16.0		0.0	56436.0	12400.0	0.0	12461.0	0.0	0.0		45200.0	10.0
15	5.0	16.0	76.0		16.0		0.0	99486.0	18615.0			0.0	0.0		45200.0	12.0
16	5.0	19.0	75.0		16.0	59.0	0.0	92909.0	24800.0	0.0		0.0	0.0	50356.0	0.0	9.0
17	5.0			NR		NR	0.0	0.0	0.0	0.0	0.0	0.0	0.0	50410.0		NR
18	5.0 5.0	30.0	74.0	5.0	18.0	60.0	0.0	72692.0	12400.0	0.0	43215.0	0.0	0.0		42700.0	9.0
20	5.0	22.0	74.0	4.0	16.0	59.0	0.2	85762.0	18600.0	0.0		0.0	0.0	50445.0	42700.0	7.0
21	5.0	24.0 15.0	74.0	4.0	16.0	59.0	0.0	49659.0	18744.0	0.0		0.0	0.0	50340.0	42700.0	7.0
22	5.0	25.0	73.0	4.0	16.0	58.0	0.0	55818.0	18640.0	0.0	18400.0	0.0	0.0	50520.0	42700.0	6.0
23	5.0	27.0		3.0	16.0	59.0	0.0	31222.0	18727.0	0.0	6200.0	0.0	0.0		42700.0	5.0
24	5.0			3.0	16.0	60.0	0.0	0.0	0.0	0.0	55700.0	0.0	0.0	50660.0	0.0	5.0
25	5.0	25.0				NR CO O	0.0	0.0	0.0	0.0	0.0	0.0	8500.0	49930.0	0.0	
26	5.0	27.0		3.0 3.0	16.0	60.0	0.0	43539.0	18703.0	0.0		0.0	8500.0		40500.0	8.0
27	5.0	32.0			16.0	60.0	0.6	37307.0	0.0	0.0		0.0	0.0	55490.0	0.0	7.0
28	5.0	20.0		4.0	16.0	59.0	0.2	55779.0	12466.0	0.0	12300.0	0.0	0.0	55350.0	42700.0	8.0
29	5.0	27.0		3.0	16.0	60.0	0.0	55770.0	0.0	0.0	18400.0	0.0	8500.0		42700.0	6.0
30	5.0	24.0		3.0	16.0	59.0	0.9	6200.0	5316.0	0.0	67667.0	0.0	0.0	54560.0	0.0	5.0
30	5.0		IAU	3.0	17.0	60.0	0.0	0.0	0.0	0.0	43419.0	0.0	0.0	55500.0	0.0	7.0
<del></del>	<u>.</u>			<u></u>							·					
<u></u> _														j		

#### Notes:

- 1. NR = No Records.
- 2. Columns II-VIII, field measured. Column VIII, Trace is less than 0.01 inches.
- 3. Column VI, if level exceeds 24 inches, leachate withdrawal from landfill must increase.
- 4. Column VII, Phase IV piezometer began monitoring on 7/10/95.
- 5. Columns IX-XIV, quantities calculated from truck weight.
- 6. Columns XV and XVI, quantities from flow meters.
- 7. Column XVII, field measured.
- 8. Values in italic are substitute for missing data and are based on averaged values.

## DAILY LEACHATE COLLECTION AND RECOVERY SYSTEM EVALUATION REPORT

# SOUTHEAST COUNTY LANDFILL (Month/Year) 9/95

		·····						Date	· · · · · · · · · · · · · · · · · · ·							
Action	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Piezometer Phase IV	S. Jak	473.5	이상은 📆	H 관리 것	\$P\$ * 为\$	可是描述。	garia.		. Hank			refer et	Highli	agent.	134 3	
Low Level Operation, depth less than or equal to 12 inches.																12.000
Normal Operation, depth greater than 12 inches and less than or equal to 24 inches.											<del> </del>					
High Level Operation, depth greater than 24 inches and less than or equal to 30 inches. Increase leachate removal and contact supervisor immediately.	<b>/</b>	NR	NR	NR					NR	NR	/					NR
Sump No. 4 Phase VI (Stormwater)	1.5		3 - 34	4.1 Table	25	ng-Fig. :	8.5.			1. (1.)	:		J.			1 2 2
Normal Operation, level is greater than or equal to 6 inches above level measured in Phase IV pieaometer.	/	NR	NR	NR		V			#R	NR					15 1	10
If level is more than 6 inches below the level measure in Phase IV piezometer, stop pumping to Basin D.										•					<b>V</b>	NK
5,000 Gallon Tank at LTRF			4 9 :	y. 1	3.3		- 1	7				72.7 -		ļ	7 .	54.
Normal Operation.					1				1							
If level is greater than 11 feet, increase treatment, hauling, or recirculation.		NR	NR	NR			<u> </u>	<u> </u>	NR	NR	- ,				. /	NR
If level is less than 6 feet, decrease or stop hauling, recirculation.																<u>/                                    </u>
Effluent Pond					100											
Normal Operation.	1				/						$\overline{}$					
If level is 6 inches or less, stop irrigation, recirculation, hauling.		NR	NR	NR			V		NR	NR		·V				NR
If level is greater than 4 feet, increase irrigation, recirculation, hauling.									/ 1 (	7410						10 1-
Observed runoff of effluent to stormwater basins?				*\ \\ \\ \\ \\ \\ \\ \\ \\ \\ \\ \\ \\ \	er terr						<del></del> -	<del></del>	<del>/</del>	/	/	<del></del>
No.		NIK	NR	NR	1				NR	NR	<del>-/</del>				-4	116
If yes, contact supervisor immediately. Stop spray irrigation. Identify Basin and type.		<b>₽</b> ×1		17.				~	10 10	/۷/\				<u> </u>		NK
Runoff Type To Basin											]			Ĭ	1	
1 = Severe A, B, C, D			·						İ					1	1	
2 = Moderate							İ	1	ľ	İ	İ	ĺ	Ī	1		
3 = Minor										ĺ	ļ	ĺ			ļ	

Prepared by:\_\_\_\_\_

#### DAILY LEACHATE COLLECTION AND RECOVERY SYSTEM **EVALUATION REPORT**

## SOUTHEAST COUNTY LANDFILL (Month/Year) 9 8

Action	17	1 10	10	- 20	1			Date							,
Piezometer Phase IV	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
Low Level Operation, depth less than or equal to 12 inches.			angle of Auto		1 de la constante de la consta	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1		5-7-6	artif anglist	s. 3000-01:	A Tey	delin () () () () () () () () () () () () ()	2 × 11 1944		
Normal Operation, depth greater than 12 inches and less than or equal to 24 inches.															
High Level Operation, depth greater than 24 inches and less than or equal to 30 inches. Increase leachate removal and contact supervisor immediately.	NR	<b>/</b>		<b>✓</b>		NR				/	/		V	WR	Ø
Sump No. 4 Phase VI (Stormwater)	rt.		7.	3 - 4.7.	1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1. 1	g.5.1.3%	a 1981	13-44	in the	ativ	MEG.	Jan de	7	A	755
Normal Operation, level is greater than or equal to 6 inches above level measured in Phase IV pieaometer.	NR	/	1			NR	V		NR	NR	MR	NR	NR	NR	
If level is more than 6 inches below the level measure in Phase IV piezometer, stop pumping to Basin D.							,		···						
5,000 Gallon Tank at LTRF			green.					Çerin e		2	,	-			
Normal Operation.				V	V		V			V	V				
If level is greater than 11 feet, increase treatment, hauling, or recirculation.	NR					NR			<b>V</b>		Y			NR	
If level is less than 6 feet, decrease or stop hauling, recirculation.						•				,					
Effluent Pond			#15g1g	11:55	///	144.00					/	8 1545			
Normal Operation.		V		V	V		V		~	V		V			
If level is 6 inches or less, stop irrigation, recirculation, hauling.	NR					NR								NR	
If level is greater than 4 feet, increase irrigation, recirculation, hauling.									,						
Observed runoff of effluent to stormwater basins?					7		. /							ļ	
No.	NR	1		V		NR	V	V		V			1	NR	i
If yes, contact supervisor immediately. Stop spray irrigation. Identify Basin and type.					3				▼		<del></del>			V 1. =	
Runoff Type To Basin					A										
1 = Severe A, B, C, D											i				
2 = Moderate					X	.									
3 = Minor	<u> </u>							I							

	001111110	entantentedial Action.	House prove		
_					

Prepared by:\_

# 1995 YEAR TO DATE LEACHATE BALANCE SUMMARY SOUTHEAST COUNTY LANDFILL HILLSBOROUGH COUNTY, FLORIDA

		Leachate Arriving at LTRF		Leachate/Effl	ent Leaving LTF	RF		Inflow/Out	flow Balance F	or LTRF
		Leachate	Total Leach. Hauled	Total Eff.	Leachate Rec.	Effluent	Effluent	Total Inflow	Total Outflow	Balance
İ	Rainfall	Pumped to LTRF	From LTRF	Hauled	From LTRF	Rec.	Sprayed	To LTRF	From LTRF	For Month
Month	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)
Jan	4.60	3,104,000	3,166,000	(1) 0	0	0	0	3,104,000	3,166,000	(62,000)
Feb_	2.40	4,063,000	2,942,000	(1) 0	0	0	650,000	4,063,000	3,592,000	471,000
March	1.90	3,467,000	2,320,000	(1) 0	0	113,000	932,000	3,467,000	3,365,000	102,000
April	1.60	2,625,000	1,124,000	393,000	60,000	0	700,000	2,625,000	2,277,000	348,000
May	2.40	2,331,000	865,725	652,689	0	0	1,000,270	2,331,000	2,518,684	(187,684)
June	8.30	2,369,000	904,543	758,000	o	0	568,520	2,369,000	2,231,063	137,937
July	17.90	2,296,000	845,087	1,185,000	0	0	319,750	2,296,000	2,349,837	(53,837)
August	15.80	2,940,000	1,620,842	1,050,000	0	0	398,520	2,940,000	3,069,362	(129,362)
September	8.80	2,939,000	1,696,897	783,000	0	25,500	507,500	2,939,000	3,012,897	(73,897)
YTD Total	63.70	26,134,000	15,485,094	4,821,689	60,000	138,500	5,076,560	26,134,000	25,581,843	552,157

#### Notes:

- 1. Effluent quantities not measured separately.
- 2. If the effluent bypass is ever used to pump effluent back to the LTRF, this table must be modified.

### LEACHATE DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Year) Sept. 95

Act	- [(.,,	1	Phase IV	Phase III	Station	Depth in	Storage	Leacha	te Hauled	Leachate	
Ar		No. 3	Riser	Riser	No. 4	500K Tank	500K Tank	Contractor	County	Recirculation	Raint
ate (acr		(inches)	(Inches)	(inches)	(inches)	(feet)	(gallons)	(gallons)	(gallons)	(gallons)	(inche
1	59	12	16	له	75	12	360K	61,900	18,827	,	
2	59	12	lle	5	76	13	390K	85,948	25,012		. 4
3	NR_	NR	NR	NR	NR	NR	NR	NR	NR		C
4	NR	NR	NR	NR	NR	NR	NR	109,500	24,800		0
5	58	12	18	7	81	10	300K	18,536	5,067		2.
6	le 2	12	18	7	81	9	270K	72,729	6,019		
7	60	12	18	7	80	9	270K	72.678	,		
8	لعا	12	18	7	77	9	270K	120,430			. 3
9	60	12	18	7	77	8	240K	42,101			. <
10	NR	NR	NR	NR	NR	NR	NR	NR	NR		(
11	61	12	17	7	75	11	330K		18,300		1.
12	100	12	16	7	77	13	390K	6,227	_		. 8
13	59	12	ile	لوا	78	14	420K	86, 288	6,345		. 2
14	59	12	110	le	78	10	300k	56, 436	12,400		C
15	59	12	16	لف	76	12	360K	99.486	18, 615		C
16	59	12	16	4	75	9	270K	92,909	24,800		6
hate Hauled	Subtotal	_ <u>.</u>		•			-	919,368	160,188		<u> </u>

	Complete Experience immediately. Complete Evaluati	on report roini.	
Comments:			 
		· .	
Prepared by:			

### LEACHATE DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Year) Sept. 95

	Active	(1) Phase IV	Station	Phase IV	Phase III	Station	Depth in	Storage	Leacha	ale Hauled	Leachate	
	Area	Piezometer	No. 3	Riser	Riser	No. 4	500K Tank	500K Tank	Contractor	County	Recirculation	Rainfall
Date	(acres)	(inches)	(inches)	(inches)	(inches)	(inches)	(feet)	(gallons)	(gallons)	(gallons)	(gallons)	(inches)
17	· · · · · · · · · · · · · · · · · · ·	NR	NR	NR	NR	NR	NR	NR	NR	NR	NR	0
18		٥ما	12	18	5_	74	9	270K	72.692	12,400	-	0
19		59	12	16	4	74	7	210K	85,762	18,600	_	.2
20		59	12	1 le	4'	74	7	210K	49,659	18,744		0
21		58	12	16	4	73	le	180K	55,818	18,640		0
22		59	12	16	3_	NR_	5	150K	31, 222	18.727		0
23		leo	12	16	_ ろ	NR	5	150K		_		0
24		NR	NR	NR	NR	NR	IVR	NR	NR	NR	NR	
25		60	12	16	3	NR	8	240K	43.539	18,703		0
26		60	12	16	<u> </u>	NR	7	210K	37,307			. 4
27		59	12	16	4	NR	8	240K	55,779	12.466		.2
28		60	12	16	3	NR	le	180K	55,770			0
29		59	12	16	<b>ヹ</b>	NIR	5	150K	6,200	5,316	_	09
30		60	12	17	3	NR	7	210K		<b>/</b> —		0
31												
Leachate Ha	auled Sub	lotal	-· <u>-</u>						493,748	123,596		

·	
(1) If depth is greater than 24 inc	ches (2.0 feel): Contact Supervisor Immediately. Complete Evaluation Report Form.
Comments:	
Leachate Hauted Month Total:	1,696,900
Prenared by:	

### EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

### (Month/Year) Sept. 95

	Depth in		Treated		·	Treated	Treated		T
	Effluent Leachate		Effluent	Treated Effluent Hauled		Effluent	Effluent	Time at	(1) Effluent
	Pond	Treated	Sprayed	Contractor	County	Recirculation	Stored	End of	Retention
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	Rainfall	Area (Y/N)
1	19	*		24,707					/Alea (MV)
2	19	45,480		18,676	_	_	45,680		
3	NR	45,320					45,320		_
4	NR	44,895		_	~	_	44,895	_	_
5		45,405		43,212	-	_	45,405	~	
6	19	43,900	_	49,370		-	43,900	_	_
7	23	45,055	32,500	49,661		_	12,555	-	N
8	21	<b>*</b>	45, 200	12,400		_	_		$\sim$
9	21	43,800		31, 155	-	_	43,800	-	~
10		44,880	_			~	46,880	-	1
11	38	<del>*</del>		61,970			-	_	
12	27	45, 225	_	67,948		_	45,225	_	_
13	27	45,340	_	24, 515	~		45,340	_	~
14	13	50, 145	45,200	12,461			5,545	-	$\sim$
15	16	51,070	45,200	12,300			4,870	-	$\sim$
16	19	50,356		12,385		_	50,356		~

(1) If yes: Contact Supervisor immediately and stop spray irrigation. Complete Evaluation Report Form.

Comments: \*\* See specators daily log

· ·	·
Prepared by:	

# EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL (Month/Year) Sept 95

	Depth in		Treated			Treated	Treated		(1) Effluent
	Effluent	Leachale	Effluent	Treated Efflu	uent Hauled	Effluent	Effluent	Time at	Runoff to
	Pond	Treated	Sprayed	Contractor	County	Recirculation	Stored	End of	Retention
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(galions)	Rainfall	Area (Y/N)
17	NR	50,410		_		_	50,400		_
18	30	50,530	42,700	43,215			7,830		N
19	22	50,445	42,700	18,405			7745	-	$\sim$
20	24	50,340	42,700	24,595			7,640	-	N
21	15	50,520	42, 700	18,400			7,820		//
22	25	50,380	42,700	6,200			7 680	1	$\mathcal{N}$
23	27	50,660	<u> </u>	55, 100			,_		_
24	NR	49, 930				8 500	-	(	
25	25	*	40,500	24,600		8,500	_		$\sim$
26	27	55,490		31,095		<b>-</b>			
27	32	55, 350	42,700	12,300			12,650		$\mathcal{N}$
28	20	55, 540	42,700	18,400		8,500	12,840	_	$\mathcal{N}$
29	27	54560		67,667			54,560		_
30	24	55,500		43,419		-	<b>'</b> -		
31									

(1) If yes: Contact Supervisor immediately and stop spray Irrigation. Complete Evaluation Report Form.

Comments: See operators daily log.

Prepared by: \_\_\_\_\_\_\_



# Hillsborough County

Allen

Department of Solid Waste \* P.O. Box 1110 Tampa, FL 33601

Sender's Telephone Number: 276-2910

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FROM: / bttg

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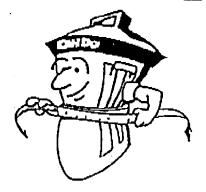


# Hillsborough County

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Sender's Telephone Number: 276-2910

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DATE:	"Together We CAN-DO It"
TO: Kim Ind	
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FROM: Patty	
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## HILLSBOROUGH COUNTY

#### Florida

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November 1, 1995

Senior Amintant County Administrator
Patricia Benta

Assistant County Administrators
Edwin Hunzeker
Czetta Johnson
Jimmie Kod
Robert Taylor

Mr. Kim Ford, P.E.
Solid Waste Permitting
Florida Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

RE: Southeast County Landfill - Leachate Management

Dear Mr. Ford:

In accordance with the Hillsborough County Department of Solid Waste's (DSW) Leachate Management Plan for the Southeast County Landfill (Landfill), the DSW is providing the Landfill's Water Balance Report Form for the month of September 1995. In addition, the DSW is providing the September 1995 field data forms for the Landfill, the daily leachate and collection system evaluation reports, and the treatment plant operator's form. The DSW is also providing the Year-to-Date Leachate Balance Summary.

This information is being provided to the Florida Department of Environmental Protection (DEP) and the Hillsborough County Environmental Protection Commission as an update on the DSW's leachate management efforts for the Landfill. This information is being provided in response to both the permitting and enforcement issues at hand.

In addition, the DSW is notifying the DEP that the purchase of the permanent pump for Temporary Pump Station No. V in Phase IV has been temporarily delayed due to problems in procurement of the specified equipment. In response to the County's bid advertisement to purchase the pump, no bids were received. The County's Purchasing Department is again attempting to seek bids. In the interim, however, the DSW is relocating the larger six inch pump from Phases V and VI to Pump Station No. V. The DSW will attempt to modify the pump with fittings and reducers to be able to connect to the four inch leachate line. Unfortunately, because of the pumping limitations during the past few months, it appears that the leachate level in the Phase IV piezometer has not yet been affected. If the connection of the six inch pump is successful, the DSW should be able to run this pump on continuous idle, resulting in greater leachate removal from Phase IV.

Post Office Box 1110 - Tampa, Florida 33601 An Affirmative Action/Equal Opportunity Employer Mr. Kim Ford November 1, 1995 Page Two

In addition, the Daily Leachate Collection and Recovery System Evaluation Report references that a header pipe broke resulting in a minor spray irrigation discharge on October 21, 1995. The DSW is providing the following information to explain the comment.

On September 21, 1995, an effluent irrigation lateral was damaged from landfilling activities resulting in a minor effluent discharge to land surface. Upon observing the damage to the lateral pipe, an employee immediately shut the irrigation system down and isolated the break from the active irrigation system. The leak duration was a few minutes.

The damage to the lateral pipe occurred on the west end of Phase I which is currently being landfilled. Approximately 200 gallons of effluent was discharged over the lined area of the landfill, with a portion of the effluent infiltrating into the cover soils of the landfill. A portion of the effluent also entered stormwater Basin A and infiltrated into the basin before it could be recovered.

The damaged lateral is still disconnected from the active spray irrigation system and will be repaired once landfilling activities in the surrounding area are completed.

Unfortunately, since the DSW administrative staff and SCS Engineers were only recently informed of the incident, the DSW was unable to report the incident to the DEP any earlier. The DSW has implemented internal procedures to ensure that landfill employees provide more timely notification of such incidents.

Regardless, the DSW intends to sample the surface and groundwater total dissolved solids (TDS) concentrations in the immediate vicinity of Basin A to determine any possible impact from the effluent discharge to either the surrounding surface or groundwater. The TDS is being evaluated since the effluent analysis indicates that TDS, of which chloride is the main component, is of concern with regard to possible impact on water quality.

The DSW proposes to collect samples from monitoring well TH-26 and from the surface water adjacent to Basin A. A groundwater sample will immediately be collected from TH-26, followed by the regular quarterly sampling event scheduled for mid-November. The surface water entering the tributary adjacent to Basin A will also be sampled immediately for TDS. Depending on results of the sampling, further assessment may or may not be necessary. The DSW will provide the DEP a copy of the analysis once it is available.

Mr. Kim Ford November 1, 1995 Page Three

Should you have any questions concerning the information provided, please call at 276-2908.

Sincerely,

Fatricia V. Berry

Landfill Services Section Manager

Department of Solid Waste

#### **Attachments**

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

Department of Environmental Regulation **Routing and Transmittal Slip** To: (Name, Office, Location) RUIZ Entrinetas 3. 3012, US MUHMA 301 WORTH Remarks: For JIE From: Date Phone

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#### 1995 YEAR TO DATE LEACHATE BALANCE SUMMARY SOUTHEAST COUNTY LANDFILL HILLSBOROUGH COUNTY, FLORIDA

		Leechate Arriving at LTRF		Leachate/Efflu	ent Leaving LTF	RF		Inflow/Out	flow Balance F	or LTRF
		Leschate	Total Lesch. Hauled	Total Eff.	Leschete Rec.	Effluent	Effluent	Total Inflow	Total Outflow	Balance
	Reinfall	Pumped to LTRF	From LTRF	Hauled	From LTRF	Rec.	Spreyed	To LTRF	From LTRF	For Month
Month	(in.)	(gal.)	(gai.)	(gel.)	(gal.)	∤gai.)	(gal.)	(gal.)	(gal.)	(gæl.)
Jan.	4.60	3,104,000	3,165,000	(1) 0	0	. 0	0	3,104,000	3,166,000	(82,000)
Feb	2,40	4,083,000	2,942,000	(1) 0	٥	0	660,000	4,083,000	3,592,000	471,000
March	1.90	3,467,000	2,320,000	(1) 0	0	113,000	932,000	3,467,000	3,365,000	102,000
Aorli	1.60	2,625,000	1,124,000	393,000	60,000	. 0	700,000	2,625,000	2,277,000	348,000
May	2.40	2,331,000	865,725	652,689	0	0	1,000,270	2,331,000	2,518,684	(187,684)
June	8.30	2,369,000	904,543	768,000	0	0	568,520	2,369,000	2,231,053	137,937
July	17.90	2,298,000	846,087	1,185,000	. 0	0	319,760	2,296,000	2,349,837	(53,837)
August	15.80	2,940,000	1,620,842	1,050,000	0	0	398,520	2,940,000	3,069,362	(129,362)
September	8.80	2,939,000	1,696,897	783,000	0	26,600	507,500	2,939,000	3,012,897	(73,897)
YTD Total	63.70	26,134,000	15,485,094	4,821,689	60,000	138,500	6.076.560	26.134.000	25,581,843	662,167

#### Notes:

- Efficient quantities not measured separately.
   If the efficient bypess is ever used to pump efficient back to the LTRF, this table must be medified.

#### LEACHATE WATER BALANCE REPORT FORM SEPTEMBER 1895

#### SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

1		П		m	īV	v	VI	VII	LANDFILL. I	IX	л соодит, г Х	ΧI	XII	XIII	XIV	ΧV	IVK
			-			Est. Depth		Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Total	
1		Area		Ì	Effluent	Over	Landfill	Pumped	in 500K	Trested	Leachete	Recir-	Pend	Effluent	Recir-	Effluent	Landfill
1		(acres)	ı	Rainfall		Uner	Storage	to LTRF	Tank	ot LTRF	Hauled	culation	Storega	Sprayed	culation	Hauled	Evaper.
Day	final	ICTIVE	int.	(ln.)	(in.)	(in.)	(gst.)	(gal.)	(gal.)	(gel.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	{gal.}	kgal.)
1	23.2	5.0	92.2	0.3	19.0	59.0	10,112 000	69,00C	345,000	45,495	80,727	. 0	58,000	0	0	25,000	0
2	23.2	5,0	92.2	0.4	19.0	59.0	10,112,000	185,00C	374,000	45,680	110,980	0	58,000	0	0	19,000	0
3	23.2	5.0	92.2	0.0	NR	MR	NR		NA	45,320	0	D	NR	Q	C	0	C
4	23.2	5.0	92.2	0.0	NR	NR	NR	NR	NIFI	44,895	134,300	0	ŔИ	0	0	0	0
	23.2	5.0	92.2	2.2	0.81	58.0	9,649,000	207,00C	288,000	45,406	23,603	0	55,000	0	0	43,000	0
8	23.2	5.0	92.2	0.4	19.0	62,0	11,503,000	94,00C	259,000	43,900	78,748	0	58,000	0	0	49,000	0
7	23.2	5.0	92.2	0.1	23.0	80.0	10,578,000	118,000	259,000	45,056	72,67B	0	71,000	32,500	0	50,000	28,000
	23.2	6.0	92.2	0.3	21.0	81.0	11,039,000	165,00C	259,000	44,428	120,630	0	65,000	45,200	0	12,000	37,000
9	23.2	5.0	92.2	0.4	21.0	80.0	10,578,000	57,00C	230,000	43,800	42,101	0	65,000	0	0	31,000	0
10		5.0	92.2	0.5	NR	NR	NR	NR	NR	46,880	0	0	NA .	0	0	0	0
11		5.0	92.2	1.3	38.0	81.0	11,039,000	198,00C	317,000	48,053	18,300	0	124,000	0	0	62,000	<u> </u>
12	23.2	5.0	92.2	0.8	27.0	80.0	10,576,000	109,000	374,000	45,225	6,227	0	85,000	0	0	68,000	0
13		5.0	92.2	0.2	27.0	59.0	10,112,000	181,000	403,000	45,340	06,833	0	85,000	0	٥	25,060	0
14	23.2	5.0	\$2.2	0.0	13.0	59.0	10,112,000	4,000	288,000	50,745	88,836	0	39,000	45,200	0	12,000	37,000
15	23.2	5.0	92.2	0.0	16.0	59.0	10,112,000	227,000	345,000	51,070	118,101	0	49,000	45,200	0	12,000	37,000
18	23.2	5.0	92.2	0.0	19.0	59.0	10,112,000	82,000	259,000	50,358	117,709	0	58,000	0	0	12,000	0
17	23.2	5.0	92,2	0.0	NR	NR	MR.	NA	NR	50,410	۵	0	HR	0	0	0	0
18	23.2	5.0	92.2	0.0	30.0	60.0	10,576,000	186,000	259,000	50,530	95,092	0	95,000	42,700	0	43,000	36,000
19	23.2	5.0	92.2	0.2	22.0	59.0	10,112,000	97,000	202,000	50,445	104,362	0	69,000	42,700	Ģ.	18,000	35,000
20		5.0	82.2	0.0		59.0	10,112,000	119,000	202,000	50,340	68,403	Q	75,000	42,700	0	25,000	35,000
21	23.2	5.0	82.2	0.0	15,0	58.0	9,849,000	96,000	173,000	50,520	74,458	O	45,000	42,700	0	18,000	35,000
22	23.2	5.0	82.2	0.0	25.0	59.0	10,112,000	72,000	144,000	50,380	48,949	0	78,000	42,700	0	8,000	35,000
23	23.2	5.0	92.2	0.0	27.0	60.0	10,578,000	51,000	144,000	50,660	D	0	85,000	0	0	58,000	0
24	23.2	5.0	92.2	0.0	NA	NA	MA	NR	NR	49,930	0	0	MR	٥	B500	0	7,000
25		5.0	92.2	0.0	25.0	69.0	10,578,000	251,000	230,000	62,710	62,242	0	78,000	40,500	8500	25,000	40,000
28		5.0	82.2	0.0	27.0	80.0	10,578,000	64,000	202,000	55,490	37,307	0	85,000	0	0	31,000	0
27	23.2	5.0	92.2	D.2	32.0	59.0	10,112,000	152,000	230,000	55,350	68,245	O	102,000	42,700	0	12,000	35,000
28		5.0	92.2	0.0	20.0	80.0	10,578,000	54,000	173,000	55,540	56,770	C	81,000	42,700	8500	18,000	41,000
29		5.0	92.2	0.9	27.0	59.0	10,112,000	37,000	144,000	54,560	11,518	0	B5,000	0	0	68,000	0
30	23.2	5.0	92.2	0.0	24.0	80.0	10,576,000	84,000	202,000	55,500	0	C	75,000	0	0	43,000	0
Total				8.80	578.0		259,295,000	2,939,000	8,305,000	1,472,012	1,095,897	0	1,802,000	507,500	25,500	783,000	435,000
Average				0.29	23.1		10,372,000	98,000		49,000	71,000	0	72,000	42,000	9,000	31,000	33,000
																Bul CD 1A	

#### 9-868ALWB2 By LER, 10/25/95.

- 1. NR = No Records.
- 2. Column II, total area with waste is 120.4 ecres (Phases I-IV).
- 3. Columns III and IV, field measured. Column III, Trace is less than 0.01 inches and is not included in total.
- 4. Column V, estimated from depth in Phase IV Plezometer.
- 5. Column VI, estimated from Column V and approximate volume with top of day elevation at 117.0 feet.
- 6. Column VII, calculated from Column IX + Column X + Change in Storage of 500,000 gal. tank.

- 7. Column VIII, calculated from depth in 500,000 gal leachate tenk.
  8. Columns IX and XIII; quantities from flow meters.
  9. Columns X, XI, XIV, and XV, quantities calculated from truck weight.
- 10. Column XVI, 80.8% of the daily values from Columns XI, XIII and XIV.

  11. Values in Italic are substitute for missing data and are based on averaged values.

#### FIELD DATA ENTRY FORM SEPTEMBER 1995

SQUTHEAST COUNTY LANDFILL HILLSBOROUGH C	ALINTY EL

	11	111	VI	V	VI	VII	VIII	XI	X	XI	ΧII	XIII	XIV	ΧV	XVI	KVII.
	Activa	Depthin	Stormwater	Phase III	Phase IV	Phase IV		Leachate	Hauled	Leachate	Effluent	Hauled	Effluent	Leachais	Effluent	Depth in
	Area .		In Sump No. 4	Riser	Aiser	Piezometer	Reinfell	Contractor	County	Recirc.	Contractor	County	Recirc.	Treated at	Sprayed	SOCK Tenk
Day	(ac.)	(ln.)	(in.)	(in.)	lin.)	(in.)	(in.)	(gal.)	(gai.)	[Jaj.]	(gsl.)	(pal.)	(gal.)	_TRF (gal.	(gal.)	[ft.l
	5.0						0.3	61900.0	18827.0	0.0	24707.0	0.0	0.0		0.0	
2			<del></del>	•			0.4	86948.0	25012.0	0.0	18676.0	0.0	0.0			
3						NR	0.0	0.0	0.0	0.0						NR
4	5.0					NR	0.0	109600.0		0.0						NR
5							2.2	18536.0	5067.0	0.0				+		
6							0.4	72729.0		0.0						
7							0,1	72678.0		0.0					32500.0	<del></del>
<u>8</u>							0,3	120630.0		0.0					45200.0	
9							0.4	42101.0	0.0	0.0		0.0				
10 11						NR	0.5	0.0		0.0	0.0	0.0				NR
	5.0 6.0						1.3	0.0	18300.0	0.0		0.0				
12	5.0 5.0						0.8	6227.0		0.0						
14	5.0 5.0						0.2	80288.0	8345.0	0.0						
15	5.0	13.0					0.0	66436.0	12400,0	0.0		0.0			45200.0	
16	5.0	16.0 19.0					0.0	99486.0	18615.0						45200.0	
17	5.0					59.0	0.0	92909.0								
18	5.0					NR	0.0	0.0		0.0						NR
19	5.0						0.0	72692.0		0.0					42700.0	
20	6.0						0.2	85762.0		0.0					42700.0	
21	6,0		73.0				0.0	49659.0							42700.0	
22	5.0			3.0			0.0	55818.0		0.0	18400.0				42700.0	
23	5.0			3.0			0.0	31222.0		0.0	6200.0	0.0			42700.0	
24	5.O			777		NR	0.0	0.0		0.0	55700.0	0.0				0.0 NR
26	5.0			3.0		60.0	0.0	43539.0		0.0		0.0	8500.0		40500.0	
26	5.0			3.0		60.0	0.6	17307.0		0.0		0.0	0.0		0.0	
27	5.0	32.0		4,0	16.0	59.0	0.0	55779.0		0.0		0.0			42700.0	
28	5.0	20.0		3.0		60.0	0.0	55770.0	0.0	0.0		0.0			42700.0	
29	5.0	27.0		3.0		69.0	0.0	6200.0	6316.0	0.0	67667.0	0.0	0.0		0.0	
30	5.0	24.0		3.0			0.0	0.00.0	0.0			0.0			0.0	
				3.0	17.0	00.0	0.0	<u> </u>	9.0	0,0	-+34 (3.0	0.0	0.0		······································	<del></del>
					<u></u>										<del>                                     </del>	<del>                                     </del>
											<u>.                                    </u>				<u> </u>	<del></del>

#### Notes:

- 1. NR = No Records.

- NK = NO Necords.
   Columns II-Viii, field measured. Column Viii, Trace is less than 0.01 inches.
   Column VI, if level exceeds 24 inches, leachate withdrawal from landfill must increase.
   Column VII, Phase IV piezometer began monitoring on 7/10/95.
   Columns IX-XIV, quantities calculated from truck weight.
   Columns XV and XVI, quantities from flow meters.
   Column XVII, field measured.
   Values in italic are substitute for missing data and are based on averaged values.



### Hillsborough County

Department of Solid Waste \* P.O. Box 1110 Tampa, FL 33601

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"Together We CAN-DO It"

DATE: 1777 TO: 10: 10: 170

744-612

- SUBJECT: Stachete Manozenart

FROM: Tilly Berry

COMMENTS (If Any):

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#### Florida

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Edwin Hunzeker
Cretta Johnson
Jimmie Keal
Robert Taylor

September 20, 1995

Mr. Kim Ford, P.E.
Solid Waste Permitting
Florida Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

RE: Southeast County Landfill - Leachate Management

Dear Mr. Ford:

In accordance with the Hillsborough County Department of Solid Waste's (DSW) Leachate Management Plan for the Southeast County Landfill (Landfill), the DSW is providing the Landfill's Water Balance Report Form for the complete month of August 1995. In addition, the DSW is providing the August 1995 field data forms for the Landfill and the daily leachate and collection system evaluation reports. The DSW is also providing the Year-to-Date Leachate Balance Summary and revised Leachate Balance Reports for January through August so that the averages include only the days with values, except for columns VII and VIII which include daily cumulative values.

This information is being provided to the Florida Department of Environmental Protection (DEP) and the Hillsborough County Environmental Protection Commission as an update on the DSW's leachate management efforts for the Landfill. This information is being provided in response to both the permitting and enforcement issues at hand.

In addition, the DSW is notifying the DEP that Temporary Pump Station No. V in Phase IV has been constructed and that leachate is being collected from this sump via a temporary pump. The permanent pump has been requisitioned and will be installed once received. SCS Engineers is in the process of completing the construction certification with all record drawings and elevations for the work completed to date and will provide this information to the County prior to October 1, 1995. The DSW will forward the certification report to the DEP once it is received.

Mr. Kim Ford September 20, 1995 Page Two

Should you have any questions concerning the information provided, please call at 276-2908.

Sincerely,

Patricia V. Berry

Landfill Services Section Manager

Father O. Berry

Department of Solid Waste

#### Attachments

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

#### 1995 YEAR TO DATE LEACHATE BALANCE SUMMARY SOUTHEAST COUNTY LANDFILL HILLSBOROUGH COUNTY, FLORIDA

		Leachate Arriving at LTRF		Leachate/E	ffluent Leaving L	TRF		inflow/Out	flow Balance F	or LTRF
		Leachate	Total Leach. Hauled	Total Eff.	Leachate Rec.	Effluent	Effluent	Total Inflow	Total Outflow	Balance
	Reinfall	Pumped to LTRF	From LTRF	Hauled	From LTRF	Rec.	Sprayed	To LTRF	From LTRF	For Month
Month	(in.)	(gal.)	(gal.)	igal.)	(gal.)	(gal.)	(,leg)	(gei.)	(gal.)	(gal.)
Jan	4.60	3,104,000	3,166,000	(1) 0	0	0	0	3,104,000	3,166,000	(52,000
Feb	2.40	4.063,000	2,942,000	(1) 0	0.	٥	650,000	4,063,000	3,592,000	471,000
March	1.90	3,467,000	2,320,000	(1) 0	0	113,000	932,000	3,487,000	3,365,000	102,000
April	1.60	2,625,000	1,124,000	393,000	60,000	0	700,000	2,625,000	2,277,000	348,000
May	2.40	2,331,000	865,725	652,689	0	0	1,000,270	2,331,000	2,518,684	(187,684
June	8.30	2,369,000	904,543	758,000	0	0	568,520	2,369,000	2,231,063	137,937
July	17.90	2,296,000	845,087	1,185,000	0	0	319,750	2,296,000	2,349,837	(53,837
August	15.80	2,940,000	1,620,842	1,050,000	0	0	398,520	2,940,000	3,069,362	(129,362
/TD Total	54.90	23,195,000	13,788,197	4,038,689	60,000	113,000	4,569,060	23 195 000	22,568,946	826,054

#### Notes:

- Effluent quantities not measured separately.
   If the effluent bypass is ever used to pump effluent back to the LTRF, this table must be modified.

#### LEACHATE WATER BALANCE REPORT FORM **AUGUST 1995**

SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

1		11		FFE	IV	V	VI	VII	VIII	IX	X	XI	XII	XIII	XIV	XV	XVI
					Depth in	Est. Depth	Est.	Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent:	Total	
A		Ares			Effluent	Over	Lendfill	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir-	Effluent	Landfill
ı		(acres		Rainfall	Pond	Liner	Storage	to LTRF	Tenk	at LTRF	Hauled	culation	Storage	Sprayed	culation	Hauled	Evapor.
Dav	final		int.	(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gai.)	(gal.)	(gaf.)	(gal.)	(gal,)	(gal.)
3	23.2	5.01	92.2	0.0	39.0	59.0	10,112,000	138,000	461,000	44,970	93,397	0	127,000	45,000	0;	36,000	36,000
2	23.2	5.0	92.2	0.4	NP	NR	NR	NR	NR	45,290	62,000	0	NP	0	0	48,000	0
3	23.2	5.0	92.2	2.5	31.0	58.0	9,649,000	163,000	403,000	45,230	67,699	0	99,000	C	0.	67,000	
4	23.2	5.0	92.2	0.1	31.0	58.0	9,649,000	112,000	403,000	45,450	66,154	Q	99,000	45,750	O:	73,000	37,000
5	23.2	5,0	92.2	0.0	32.0	58.0	9,649,000	120,000	432,000	45,560	45,728	0	102,000	0	0:	55,000	
6	23.2	5.0	92.2	0.0	NA	NR	NR	NR	NR	45,260	0	0	MP	0	0!	0	
7	23.2	5.0	92.2	0.0	39.0	58.0	9,649,000	143,000	432,000	45,230	52,62 <b>7</b>	0	127,000	37,440	0	50,000	30,000
В	23.2	5.0	92.2	0.0	26.0	58.0	9,649,000	142,000	432,000	45,330	96,408	0_	81,000	45,750		25,000	37,000
9	23.2	5.0	92.2	0.0	20.0	59.0	10,112,000	120,000	403,000	32,860	116,408	0	61,000	45,700	0	12,000	37,000
10	23.2	5.0	92.2	0.0	18.0	58.0	9,649,000	61,000	317,000	36,590	110,529	0	49,000	0	0	19,000	
11	23.2	5.0	92.2	0.0	24.0	58.0	9,649,000	98,000	259,000	45,790	109,307	0	75,000	O	0	6,000	0
12	23.2	5.0	92.2	0.7	18.0	58.0	9,649,000	70,000	230,000	45,385	53,350	0_	55,000	. 0	10	49,000	0
13	23.2	5.0	92.2	0.0	NR	NR	NR	NR	NR	44,960	0	0	NF	0	ol	0	0
14	23.2	5.0	92.2	0.5	30.0	60.0	10.576,000	197.000	288,000	45,160	49,696	0	95,000	0	Oi	25,000	0
15	23.2	5.0	92.2	1.5	31.0	59.0	10,112,000	34,000	259,000	44,325	18,623	0	99,000	0	0	55,000	0
76	23.2	5.0	92.2	0.3	33.0	59.0	10,112,000	86,000	288 000	45,045	11,954	0	106,000	0	0 1	74,000	0
17	23.2	5.0	92.2	0.0	27.0	58.0	9,649,000	118,000	317,000	45,350	43,419	0	65,000	42,200	0	31,000	34,000
18	23.2		92.2	0.0				108,000	288,000	44,390	92,103	0	55,000	0	0	6,000	0
19	23.2	5.0	92.2	0.0		59.0	10,112,000	61,000	230,000	45,740	73,193	0	71,000	0	0	0	0
20	23.2	5.0	92.2	0.0	NR	NR	NR	NR.	NR	44,665	0	0	NP.	0	0	0	0
21	23.2	5.0	92.2	0.0	29.0	57.0	8,185,000	131,000	230,000	42,350	43,571	0	92,000	0_	0	49,000	0
22	23.2	5.0	92.2	1.5	30.0	57.0	8,185,000	105,000	259,000	45,220	31,088	0	95,000	0	0	43,000	0
23	23.2	5.0	92.2	0.0	35.0	59.0	10,112,000	129,000	288,000	45,215	55,057	O	113,000	0	0	19,000	0
24	23.2	5.0	92.2	0.0	26.0			59,000	259,000	44,590	43,536	0	81,000	45,560	0	37,000	37,000
25	23.2	5.0	92.2	0.7	24.0			111,000	288,000	45,125	37,188	. 0	75,000	O	0	56,000	0
26	23.2	5.0	92.2	4.5	29.0	58.0	9,649,000	64,000	288,000	45,660	18,708	0	92,000	O	0	68,000	0
27	23.2	5.0	92.2	1.8	NA	NR	NR	NR	NR	44,870	0	0	NR	0	0	0	0
28	23.2	5.0	92.2	0.4	37.0	59.0	10,112,000	125,000	317,000	45,030	6,120	0	120,000	0	0	61,000	0
29	23.2	5.0	92.2	0.8	33,0	59.0	10,112,000	144,000	403,000	45,370	12,367	0	106,000	0	0	68,000	0
30		5.0	92.2	0.1	29.0			190,000	461,000	44,890	87,165	0	92,000	45,560	0	12,000	37,000
31	23.2	5.0	92.2	0.0				111,000	403,000	45,310	123,451	0	61,000	45,560	0	6,000	37,000
		1		,-			<del></del>								1		lì
Total				15.80	73C.0	1524.0	258,284,000	2,940,000	8,638,000	1,376,230	1,620,842	0	2,313,000	398,520	0	1,050,000	322,000
Aversae				0.51	28.1	58.6		95,000		44,000	60,000	0	89,000	44,000	0	40,000	36,000
							<del></del>									B2 Revised by	61 1 6/14/08

8-95BALLY/B2 Revised by BLJ, 9/11/86.

#### Notes:

- 1. NR = No Records.
- 2. Column II, total area with waste is 120.4 acres (Phases HV).
- 3. Columns III and IV, field measured. Column III, Trace is less than 0.01 inches and is not included in total.
- 4. Column V, estimated from depth in Phase IV Plazometer.
- 5. Column VI, estimated from Column V and approximate volume with top of clay elevation at 117.0 feet.
- 6. Column VII, calculated from Column IX + Column X + Change in Storage of 500,000 gal. tank.
- 7. Column VIII, calculated from depth in 500,000 gal. leachate tank.
- 8. Columns IX and XIII, quantities from flow meters.
- 9. Columns X, XI, XIV, and XV, quantities calculated from truck weight.
- 10. Column XVI, 80.8% of the daily values from Columns XI, XIII and XIV.
- 11. Values in italic are substitute for missing date and are based on averaged values.

### FAX COVER

### TO:

DATE:

August 17, 1995

NAME:

Mr. Robert Butera

ORGANIZATION:

**FDEP** 

FAX NUMBER:

813/744-6125

PHONE NUMBER:

813/744-6100

### SCS ENGINEERS

**Environmental Consultants** 

3012 U.S. Highway 301 North Suite 700 Tampa, Florida 33619 Phone 813 621 0080 FAX 813 623-6757

FROM:

Larry E. Ruiz

JOB NUMBER:

0990018.35

NUMBER OF PAGES:

3

### **COMMENTS:**

Please confirm receipt of fax to llene at 813/621-0080.

**Environmental Consultants** 

3012 U.S. Highway 301 North Suite 700 Tampa, IT 33619 2242 RIS 7. POR FAX 3. POST

#### SCS ENGINEERS

File No. 0990018.35 August 17, 1995

Mr. Kim B. Ford, P.E.
Solid Waste Section
Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

Subject:

. Temporary Pump Station #5 Construction, Southeast County Landfill

Hillsborough County, Florida.

#### Dear Mr. Ford:

Please be advised that the Hillsborough County Department of Solid Waste (HCDSW) is planning to begin construction activities for the Temporary Pump Station #5 (TPS-5) on August 21, 1995. The construction schedule will be as follows:

- August 16, 1995 County surveyor was on site to stake the approximate location of the leachate collection header.
- August 21, 1995 HCDSW personnel will begin the excavation to locate the header. SCS Engineers will be on-site to monitor excavation activities.
- August 23, 1995 County plumber will be on-site to clean the header.
- August 25, 1995 Fife Industrial Pipe Company (FIFE), will be on-site to install the suction line and connections to the existing force main.
   County surveyor will be on-site to document "as-built" conditions.
- August 26, 1995 HCDSW personnel will backfill the construction area.

After these activities are completed, the HCDSW will install a temporary pump to the system. Final connections and pump controls will be installed when the permanent pump arrives.

Mr. Kim B. Ford, P.E. August 17, 1995 Page 2

Please call if you have any questions.

Very truly yours,

Larry E. Ruiz Senior Project Engineer

Robert B. Gardner, P.E.

Vice President

**SCS ENGINEERS** 

LER/RBG:ikm

cc: Patricia Berry, HCDSW Matt Mathews, HCDSW

Robert Butera, P.E., FDEP - Tampa

Paul Schipfer, HCEPC

### HILLSBOROUGH COUNTY

#### Florida

Office of the County Administrator
Daniel A. Kleman

**BOARD OF COUNTY COMMISSIONERS** 

Dottie Berger Phyllis Busansky Joe Chillura Chris Hart Jim Norman Ed Turanchik Sandra Helen Wilson



Senior Assistant County Administrator Patricia Bean

Assistant County Administrators Edwin Hunzeker Cretta Johnson Jimmie Keel Robert Taylor

August 14, 1995

Mr. Kim Ford, P.E.
Solid Waste Permitting
Florida Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

AUG 1 7 1995

L. Environmental Protection SOUTHWEST DISTRICT

BY.

RE: Southeast County Landfill - Leachate Management

Dear Mr. Ford:

In accordance with the Hillsborough County Department of Solid Waste's (DSW) Leachate Management Plan for the Southeast County Landfill (Landfill), the DSW is providing the Landfill's Water Balance Report Form for the complete month of July 1995. In addition, the DSW is providing the July 1995 effluent and leachate field data forms for the Landfill and the daily leachate and collection system evaluation reports.

This information is being provided to the Florida Department of Environmental Protection (DEP) and the Hillsborough County Environmental Protection Commission as an update on the DSW's leachate management efforts for the Landfill. This information is being provided in response to both the permitting and enforcement issues at hand.

Should you have any questions concerning the information provided, please call at 276-2908.

Sincerely.

Patricia V. Berry

Landfill Services Section Manager

Department of Solid Waste

Attachments

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

Post Office Box 1110 - Tampa, Florida 33601 An Affirmance Action/Equal Opportunity Employer

#### **BEST AVAILABLE COPY**

#### LEACHATE WATER BALANCE REPORT FORM JULY 1995

#### SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

1		П		III	IV	V	VI	VII	VIII	IX	Χ	XI	XII	XIII	XIV	XV	XVI
					Depth in	Est. Depth		Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Total	
		Area			Effluent	Over	Landfill	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir-	Effluent	Landfill
		(acres)		Rainfall	Pond	Liner	Storage	to LTRF	Tank	at LTRF	Hauled	culation	Storage	Sprayed	culation	Hauled	Evapor.
Day	final	active	int.	(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)
1	23.2	5.0	92.2	0.0	14.0	16.0	1,189,000	74,000	374,000	44,985	0	0	42,000	0	0	31,000	0
2	23.2	5.0	92.2	0.0	NR	NR	NR	NR	NR	45,415	0	0	NR	0	0	0	0
3	23.2	5.0	92.2	0.1	20.0	16.0	1,189,000	163,000	403,000	44,890	43,549	0	61,000	44,200	0	37,000	36,000
4	23.2	5.0	92.2	0.0	21.0	NR	NR	NR	NR	44,965	0	0	65,000	0	0	0	0
5	23.2	5.0	92.2	0.0	20.0	16.0	1,189,000	128,000	403,000	45,585	37,632	0	61,000	42,250	0	37,000	34,000
6	23.2	5.0	92.2	0.0	20.0	16.0	1,189,000	117,000	432,000	44,865	43,431	0	61,000	42,250	0	31,000	34,000
7	23.2	5.0	92.2	0.0	18.0	17.0	1,264,000	50,000	374,000	45,590	62,287	0	55,000	42,250	0	31,000	34,000
8	23.2	5.0	92.2	0.0	16.0	17.0	1,264,000	51,000	374,000	45,070	6,200	0	49,000	0	0	44,000	78)
9	23.2	5.0	92.2	0.0	NR	NR	NR	NR	NR	45,070	0	0	NR	0	0	0	100
10	23.2	5.0	92.2	0.0	32.0	58.0	9,649,000	169,000	403,000	45,065	50,274	0	102,000	42,250	0	37,000	34,000
11	23.2	5.0	92.2	0.0	27.0	58.0	9,649,000	79,000	374,000	45,160	62,308	0	85,000	42,250	0	31,000	34,000
12	23.2	5.0	92.2	0.0	24.0	58.0	9,649,000	50,000	317,000	45,103	62,132	0	75,000	36,900	0	31,000	30,000
13	23.2	5.0	92.2	2.2	21.0	58.0		41,000	288,000	45,045	25,041	0	65,000	0	0	68,000	0
14	23.2	5.0	92.2	0.3	20.0	58.0		70,000	288,000	45,315	24,900	0	61,000	0	0	31,000	0
15	23.2	5.0	92.2	0.0	24.0	58.0		35,000	259,000	45,360	18,756	0	75,000	0		39,000	0
16	23.2	5.0	92.2	0.0	23.0	58.0		74,000	288,000	45,000	0		71,000	27,400		0	22,000
17	23.2	5.0	92.2	0.6	36.0	59.0	10,112,000	6,000	230,000	45,000	18,697	0	116,000	0		42,000	0
18	23.2	5.0	92.2	3.4	35.0	60.0		35,000	202,000	44,900	18,600	0	113,000	0		74,000	0
19	23.2	5.0	92.2	1.5	34.0	59.0		86,000	230,000	45,135	12,400	0	109,000	0		75,000	0
20	23.2	5.0	92.2	0.2	33.0	58.0		99,000	259,000	45,253	24,982	0	106,000	0		68,000	0
21	23.2	5.0	92.2	1.8	33.0	59.0		42,000	230,000	45,370	24,973	0	106,000	0	-	68,000	0
22	23.2	5.0	92.2	0.0	31.0	16.0		122,000	288,000	45,410	18,697	0	99,000	0	_	68,000	0
23	23.2	5.0	92.2	0.4		NR	NR	NR	NR	44,890	0		NR	0		0	0
24	23.2	5.0	92.2	0.3	30.0			201,000	374,000	44,765	25,086	0	95,000	0		37,000	0
25	23.2	5.0	92.2	0.1	28.0	16.0		117,000	403,000	44,640	43,456	0	88,000	0		37,000	0
26	23.2	5.0	92.2	1.7	25.0	16.0		82,000	403,000	38,120	43,754	0	78,000	0		50,000	0
27	23.2	5.0	92.2	2.9	27.0	17.0		95,000	403,000	45,310	49,239	0	85,000	0	-	49,000	0
28	23.2	5.0	92.2	0.4	30.0	16.0	412,000	88,000	403,000	45,080	42,435	0	95,000	0		55,000	0
29	23.2	5.0	92.2	0.4	30.0	17.0		88,000	403,000	44,978	43,037	0	95,000	0		60,000	0
30	23.2	5.0	92.2	1.5		NR NR	NR	NR	NR	44,875	43,037		NR	0		00,000	
31	23.2	5.0	92.2	0.1	39.0			191,000	461,000	45,525	43,221	0	127,000	0		54,000	
- 31	20,2	5.0	02.2	0.1	55.0	17.0	433,000	101,000	401,000	40,020	40,221	0	127,000	0		34,000	
Total				17.90	711.0	929.0	128,857,000	2,353,000	8,866,000	1,391,734	845,087	0	2,240,000	319,750	0	1,185,000	258,000
Daily Avg				0.58	26.3	35.7		76,000	341,000	45,000	35,000	0	77,000	40,000	0	47,000	32,000

#### 7-95BAL.WB2 Revised by XF, 8/04/95.

#### Notes:

- 1. NR = No Records.
- 2. Column II, total area with waste is 120.4 acres (Phases I-IV).
- 3. Columns III and IV, field measured. Column III, Trace is less than 0.01 inches and is not included in total.
- 4. Column V, estimated from depth in: Before 7/10/95 Phase IV riser and after 7/10/95 Phase IV Piezometer.
- 5. Column VI, estimated from Column V and approximate volume with top of clay elevation at: Before 7/10/95 118.5 feet and after 7/10/95 117.0 feet.
- 6. Column VII, calculated from Column IX + Column X + Change in Storage of 500,000 gal. tank.
- 7. Column VIII, calculated from depth in 500,000 gal. leachate tank.
- 8. Columns IX and XIII, quantities from flow meters.
- 9. Columns X, XI, XIV, and XV, quantities calculated from truck weight.
- 10. Column XVI, 80.8% of the daily values from Columns XI, XIII and XIV.
- 11. Values in italic are substitute for missing data and are based on averaged values.

### LEACHATE DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Year) <u>July</u>, 1995

	Sump No. 3		(1) Phase N Piezometer		. :	Depth in	Storage	Leachat	e Hauled	Leachate		1
Date :	(Inches)		1	Riser	i	500K Tank	500K Tank	Contractor	County	Recirculation	Rainfall	
0816		(Inches)	(Inches)	(Inches)	(Inches)	(feet)	(gallons)	(gallons)	(gallons)	(gallons)	(inches)	Initia
1	12	16	NIC	4_	71	13	390K	~			D	1
2	12	N/R	NR								0	<del> </del>
3	12	16	NR	4	60	14	420K	24.949	18,600			<del> </del>
4	12	N/R	NR					1	10,600		X.1	-
5	12	16	NAR	3	60	14	420 K	18.901	18.731		0	
6	12	16	NIR	7	60	15	450K	43,431-	10, (31		0	ļ
7	12	۱ ۲	\$3	4	59	13	390K	<del>                                     </del>	18 741	-	0	
8	12	17	NR	4	66	17	390K	1 2 , 8 , 4	18,741		O O	
9	12	NA	NIR		0 0	_ /	3 1010	6,200			D	<del></del>
10	12	16	58	3	66	14	420 K	31 472	10010		0	
11	12	16	28	3		13			18,842		0	
12	1~	) /	28	3	24		390K	43,587	18,721		0	
	·	16	58	3	61		330K	43,400	18,732	····	0	
13	12				64	10	300K	6,197	18,844		22	
14	12	18	58	٦ ا	62	10	300/6	6,200	18,700		X.3	
15	25	20	58	4	66	9	270 K		18,756		0	
16	1/	21	58	ذ ا	60	10	300 K				8	
chate Ha	uled Subtota	i										

•	The state of the s	
Comments:		÷
		<del></del>

### LEACHATE DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Year) July, 1995

			(1) Phase IV	Phase III		Depth in	Storage	Leacha	le Hauled	Leachato	· ·	
	Sump No. 3	Riser	Piezometer	Riser	Sump No. 4	500K Tank	500K Tank	Contractor	County	Recirculation	Rainfall	
Date	(inches)	(inches)	(inches)	(inches)	(inches)	(feet)	(gallons)	(gallons)	(gallons)	(gallons)	(inches)	Initials
17	26	26	59	6_	69	8	240 K	_	18,697		X.6	
18	32	32	60	11	NIR	7	210K	_	18,600		3.4	
19	12	21	59	7	N/R	8	240K	12,400			1.5	
20	12	20	58	7	NR	9	270K	6,216	18,766		X.2	
21	12	21	59	6	N/R	8	240K	6,240	18,733		1.8	
22	12	16	88	6	N/R	10	300K		18.697		8	
23	12										x.4	
24	12	15	58	4	NIR	13	390K	25.086		· · · · · · · · · · · · · · · · · · ·	X.3	
25	12	16	57	4	NIR	14	420 K	24,698	18.758		XI	
26	12	16	29	5	W/R	14	420 K	24,931	18.823		17	
27	12	17	59	8	48	14	420 K	24,274	24.965	·	2.9	ı
28	12	16	59	7	25	14	420 K	18,000	24,435		X.4	
29	12	17	59	J	N/R	14	420K	11 721	31,316		X.4	<del></del>
30	12					_					1.5	
31	12	17	59	6	N/R	16	480K	18,143	25 078	-	X. /	
chate Ha	úled Subtota	ı							,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,		171./	

(1) If depth is greater than 27.6 inches (2.3 feet): Contact Supervisor immediately. Complete Evaluation Report Form.	
Comments:	
Leachate Hauled Month Total:	

### EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Year) 541, 1985

	Depth in Effluent	Leachate	Treated Effluent	Treated Efflu	ent Hauled	Treated Effluent	Treated Effluent	Time at	(1) Effluent Runoff to	
Ì	Pond	Treated	Sprayed	Contractor	County	Recirculation	Stored	End of	Retention	
Date	(inches)	(gallons)	(gallons)	(gallons)	(galions)	(gallons)	(gallons)	Rainfall	Area (Y/N)	Initials
1	14	44985		31,053			44,985			
2	NR	45 415				_	45,415			
3	20	44.890	44,200	37,198		_	690		N	
	21	44.965					44 965			
	20	45,585	42,250	37,400			3 608		W	
6	20	44,865	42,250	30,895			2'615		N	
7	18	45,590	42,250	30,995			3,340		N	
	16	45 070	<u> </u>	43,578			45,070			
9	NIR	45,070				-	45,070			
10	32	45,065	42,250	37,363			2815		N	
11	27	45,160	42,250	30,863			2,910		N	
12	24	N/R	36,900	30,979			N/R		N	
13	21	45,045	<u> </u>	68,184			45,045			
	20	45,315		31,352			45,315			
	24	45, 360		37.060			45360			
1	23	NIR	27,400		- -		XXX		N	

Comments:		

(1) If yes: Contact Supervisor immediately and stop spray irrigation. Complete Evaluation Report Form.

### EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL (Month/Year) <u>Sにくら、1</u>995

	Depth in		Treated			Treated	Treated		(1) Effluent	
	Effluent	Leachate	Effluent	Treated Efflue	ent Hauled	Effluent	Effluent	Time at	Runoff to	
ļ	Pond	Treated	. Sprayed	Contractor	County	Recirculation	Stored	End of	Retention	
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	Rainfall	Area (Y/N)	Initials
17	36	K/R		41,551			N/R			
18	35	44 900	·	74,483			44,900	,		
19	34	45,135		74 513			45,135			
20		N/R		68,390	· · · · · · · · · · · · · · · · · · ·		NIR			
21	33	45,370		68, 482			45,370			
22	31	45,410		68,465			45,410			~ <del></del>
23	NR	44.890					44,890			
24	30	N.IR.	24,300	37,351			N/R.		N	
25	28	44,640	43,500	37,195			1,140		N	
26.	25	38,120		49,562			38,120			
27	27	45,310		45 150			45,310			<u> </u>
28	30	45 080		54.568			45,080			
29	30	NIR		60,493			N, R.			
30	1110	44.875		<u></u>			44,875			
31	39	45.525		54,338			45,525			

(1) If yes: Contact Supervisor immediately and stop spray irrigation. Complete Evalua	ation Report Form.	
Comments:		

Date:	7-31-95 M. MATThero.			V 1	
nspector:	19. MAITHEW	<u>C</u> Rai	nfall: _	X,1	
`	re IV s Riser Phase IV below 27.6 Yes: In compliance. No: Increase leachate Contact supervise	removal required			
1	r Phase IV s Piezometer Phase IV belov (es: In compliance. No: Increase leachate Contact superviso	removal required			
	4 Phase VI (Stormwater) : Normal Operation : If level is less than lev	vel in Riser Phase	IV, stop pu	mping to Basin I	D.
500,000 G - - -	Sallon Tank at LTRF  : Normal Operation. : If level is greater than : If level is less than 6 to	11 feet, increase or	e treatment, stop hauling	hauling, or recigly recirculation.	rculation.
Effluent Po	ond  Normal Operation.  If level is 6 inches or I  If level is greater than	y. ess, stop irrigatio 4 feet, increase	on/ recircula irrigation/ re	tion/hauling circulation/hauli	ing.
Observed 1	unoff of effluent to stormw	– ater basins? (Y€	s/Not		
	entact supervisor immediatel op spray irrigation immediat		he following	information:	
	Runoff Type Severe Moderate Minor	To Basin  A B C D	•		
omments/F	Remedial Action:				
				·····	
					-

Date:	1-29-95
nspector:	M. MATTheros Rainfall: X.4
•	se IV Is Riser Phase IV below 27.6 inches (2.3 feet)? Yes: In compliance. No: Increase leachate removal required. Contact supervisor immediately.
	er Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes: In compliance. No: Increase leachate removal required. Contact supervisor immediately.
Sump No.	4 Phase VI (Stormwater)  : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.
	Gallon Tank at LTRF
Effluent Po	ond  Normal Operation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.
If Yes: Co	runoff of effluent to stormwater basins? (Yes/No) ontact supervisor immediately. top spray irrigation immediately and provide the following information:
	Runoff Type       To Basin         Severe       A         Moderate       B         Minor       C         D
omments/l	Remedial Action:
<del></del>	

ate:	1-28.95			
nspector:	M. MATThes	25	Rainfall:	<u> </u>
)	e IV s Riser Phase IV below 27. es: In compliance. lo: Increase leachate Contact supervis	e removal re	quired.	
, N	s Piezometer Phase IV belo es: In compliance. lo: Increase leachate Contact supervis	e removal rec or immediate	quired.	·
	4 Phase VI (Stormwater) : Normal Operation : If level is less than le		Phase IV, stop p	oumping to Basin D.
	allon Tank at LTRF : Normal Operation. : If level is greater than : If level is less than 6	n 11 feet, ind feet, decrea	crease treatmer se or stop hauli	nt, hauling, or recirculation. ng/ recirculation.
Effluent Po	nd  : Normal Operation. : If level is 6 inches or : If level is greater than	less, stop im 1 4 feet, incr	igation/ recirculease irrigation/	lation/hauling recirculation/hauling.
Observed re	unoff of effluent to stormw		<del></del>	
If Yes: Co	ntact supervisor immediate op spray irrigation immediat	elý.		ng information:
	Runoff Type Severe Moderate Minor	To Basi A B C	in C	
omments/R	emedial Action:			
				·
			, <del>, , , , , , , , , , , , , , , , , , ,</del>	

ate:	7-27	-95					
ispector:	M. M	-95 ATTheros	<u>c</u>	Rainfall:	2.	9	
Ye	Riser Phase s: In c : Incr	V below 27.6 i ompliance. ease leachate re tact supervisor	emoval req	uired.		<u> </u>	
Ye	Phase IV Piezometer F s: In c	hase IV below	27.6 inche	s (2.3 feet)?	,		
	: Normal	Stormwater) Operation I leve	l in Riser Pl	nase IV, sto	p pumping :	to Basin D.	· · · · · · · · · · · · · · · · · · ·
Etfluent Pon	: If level i	Operation. s greater than 1 s less than 6 fe					tion.
	: If level i	6 6 inches or les 6 greater than 4					
If Yes: Con	tact supervis	ent to stormwat or immediately tion immediatel	•		wing inform	'. pation:	
	Runoff Typ Seve Mod	ere erate	To Basi A B C	1			
Comments/Re	medial Actio	n:					

Date:	7-26-95				
nspector:	M. MATThez	20	Rainfall:	٠., ٢	
Yes	Riser Phase IV below 27. s: In compliance: Increase leachate Contact supervis	e removal requi	red.		
Yes	hase IV Piezometer Phase IV belo S: In compliance. Increase leachate Contact supervis	e removal requi	red.		
Sump No. 41	Phase VI (Stormwater) : Normal Operation : If level is less than le		se IV, stop p	umping to Basin D.	
Effluent Pond	: It level is less than 6	feet, decrease	or stop hauli		•
	<ul><li>: If level is 6 inches or</li><li>: If level is greater than</li><li>off of effluent to stormw</li></ul>	4 feet, increas	se irrigation/	ation/hauling recirculation/hauling.	<del>-</del> :
If Yes: Conta	act supervisor immediate spray irrigation immediat	ely. tely and provide		ng information:	
	Runoff Type Severe Moderate Minor	To Basin A B C D			
omments/Ren -	nedial Action:				
					<u> </u>

snector:	1-25.95
ispector.	M. MATThews Rainfall: X. 1
Riser Phase	- IV
	Riser Phase IV below 27.6 inches (2.3 feet)?
Y	es : In compliance.
	o: Increase leachate removal required.
• • • • • • • • • • • • • • • • • • • •	Contact supervisor immediately.
<del></del>	
Piezometer	
	Piezometer Phase IV below 27.6 inches (2.3 feet)?
Y	es: In compliance.
, N	o: Increase leachate removal required.
	Contact supervisor immediately.
<del></del>	
Sump No. 4	4 Phase VI (Stormwater)
,	: Normal Operation
	: If level is less than level in Riser Phase IV, stop pumping to Basin D.
F00 000 C	
	allon Tank at LTRF
	Normal Operation.
	: If level is greater than 11 feet, increase treatment, hauling, or recirculation.
	: If level is less than 6 feet, decrease or stop hauling/ recirculation.
Effluent Por	nd
	: Normal Operation.
	: If level is 6 inches or less, stop irrigation/ recirculation/hauling
	: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.
Observed ru	unoff of effluent to stormwater basins? (Yes (No)
If Yes: Cor	ntact supervisor immediately.
	p spray irrigation immediately and provide the following information:
	Runoff Type To Basin
	Runoff Type To Basin Severe A
	Runoff Type To Basin Severe A Moderate B
	Runoff Type To Basin Severe A Moderate B Minor C
	Runoff Type To Basin Severe A Moderate B
Sto	Runoff Type To Basin Severe A Moderate B Minor C D
Sto	Runoff Type To Basin Severe A Moderate B Minor C
Sto	Runoff Type To Basin Severe A Moderate B Minor C D
Sto	Runoff Type To Basin Severe A Moderate B Minor C D
Sto	Runoff Type To Basin Severe A Moderate B Minor C D
Sto	Runoff Type To Basin Severe A Moderate B Minor C D
Sto	Runoff Type To Basin Severe A Moderate B Minor C D

ate:	7-24-95				
rspector:	7-24-95 M. MATTheros	<u>r</u>	Rainfall:	Χ.૩	
Riser Phase		-			
is Ya	Riser Phase IV below 27.6 cs: In compliance.	inches (2.3 f	eet)?		
No	compliance.  Increase leachate r	removal reou	ired		
	Contact supervisor	immediately	···		
Piezometer					
ls	Piezometer Phase IV below	27.6 inches	(2.3 feet)?		
Y C	es: In compliance.				
, 140	: Increase leachate r Contact supervisor	emoval requi	red.		
	Contact supervisor	шинеогатегу	•		
Sump No. 4	Phase VI (Stormwater)	<u> </u>		·	
comp no. 4	: Normal Operation				
	: If level is less than leve	el in Riser Pha	se IV, stop	pumping to Basin D.	
500,000 Ga	Illon Tank at LTRF	······			
	: Normal Operation.			•	
	: If level is greater than 1	11 feet, incre	ase treatme	ent, hauling, or recirculation	١.
	: If level is less than 6 fe	et, decrease	or stop hau	ling/ recirculation.	
Effluent Pon	d _				
	: Normal Operation.	- \(\frac{1}{4}\)			
	: If level is 6 inches or le	ss, stop irriga	ation/ recirc	ulation/hauling	
	: If level is greater than 4	feet, increa	se irrigation	/ recirculation/hauling.	
Observed rui	noff of effluent to stormwat	ter basins? (	Yes (No)		
•				•,	
	tact supervisor immediately				
Stot	spray irrigation immediatel	y and provid	e the follow	ing information:	
	Runoff Type	To Basin		•	
	Severe	A			
	Moderate	В		•	
	Minor	c			
<del></del>	<u> </u>	D		· · · · · · · · · · · · · · · · · · ·	
omments/Re	medial Action:				
•					
<del></del>				· · · · · · · · · · · · · · · · · · ·	
<del></del>			<del></del>		
	·				
	V-14	<del></del>			

Date:	7-22-95		
nspector:	M. MATThew.	S Rainfall:	
Ye	IV Riser Phase IV below 27.6 in es: In compliance. Increase leachate re Contact supervisor	emoval required.	
Yo	Phase IV Piezometer Phase IV belowes	emoval required. immediately.	7
Sump No. 4 	Phase VI (Stormwater) : Normal Operation : If level is less than level		op pumping to Basin D.
	Ilon Tank at LTRF : Normal Operation. : If level is greater than 1 : If level is less than 6 fee	1 feet, increase treate et, decrease or stop h	ment, hauling, or recirculation. auling/ recirculation.
Etfluent Pon	d : Normal Operation. : If level is 6 inches or les : If level is greater than 4		
If Yes: Con	noff of effluent to stormwat tact supervisor immediately. o spray irrigation immediately		owing information:
·	Runoff Type Severe Moderate Minor	To Basin  A B C D	
omments/Re	medial Action:		

Riser Phase IV Is Riser I Yes No  Piezometer Phase Is Piezom Yes No Sump No. 4 Phase: No: If	Phase IV below 27.6 in	nches (2emoval re immediat 27.6 inch	equired. lely. nes (2.3 fee			3	
Is Riser I Yes No  Piezometer Phase Is Piezon Yes No  Sump No. 4 Phase: No: If: If: If: If	: In compliance. :: Increase leachate re Contact supervisor in  IV neter Phase IV below 2 :: In compliance. :: Increase leachate re Contact supervisor in  VI (Stormwater) ormal Operation	emoval re immediat 27.6 inch	equired. lely. nes (2.3 fee	1)7			
Is Piezon Yes No Sump No. 4 Phase : No : If 500,000 Gallon Ta : If : If	IV neter Phase IV below 2 : In compliance. :: Increase leachate re Contact supervisor i  VI (Stormwater) ormal Operation	27.6 inch	nes (2.3 fee	1)7			
	ormal Operation						
500,000 Gallon Ta : No : If : If		in Riser I	Phase IV, s	top pum	ping to I	Basin D.	
Effluent Pond	onk at LTRF ormal Operation. level is greater than 1 level is less than 6 fee	1 feet, in	crease trea	itment, h	nauling, i	or recirc	ulation.
: No : If	ormal Operation. level is 6 inches or less level is greater than 4	); is, stop in feet, incr	rigation/ re	circulatio	on/haulin	g Vhauling	a.
	effluent to stormwate						
If Yes: Contact su	pervisor immediately.			llowing i	nformati	on:	
	off Type _ Severe _ Moderate _ Minor	To Bas				·	
omments/Remedial ·	Action:				<del></del>		
				<u> </u>			

Date:	1-20-95				
nspector:	M. MATThe	2 ws	Rainfall:	<u> </u>	. ک
Ye	IV Riser Phase IV below 25 es: In compliance. o: Increase leacha Contact superv	ate removal req	uired.		
Ye	Phase IV Piezometer Phase IV belos: In compliance. Increase leacha Contact superv	ate removal req	uired.		
	Phase VI (Stormwate : Normal Operation : If level is less than	•	hasė IV, <b>s</b> top	pumping to f	Basin D.
500,000 Ga	allon Tank at LTRF  : Normal Operation. : If level is greater th : If level is less than	an 11 feet, inc 6 feet, decreas	rease treatme se or stop hau	nt, hauling, i	or recirculation.
Effluent Por	.: Normal Operation: If level is 6 inches o .: If level is greater the	or less, stop irri an 4 feet, incre	gation/ recirco	ulation/haulin	g n/hauling.
•	noff of effluent to storm	nwater basins?			
	tact supervisor immedia p spray irrigation immedi		ide the follow	ing informati	on:
	Runoff Type Severe Moderate Minor	To Basi A B C D			
omments/Re	emedial Action:				
·				<u> </u>	
		13			•

Ye	IV Riser Phase IV below 27 s: In compliance: Increase leachat Contact supervis	e removal required.		
Ye	Phase IV Plezometer Phase IV belo s: In compliance. Increase leachat Contact supervis	e removal required.	ee1)?	
	Phase VI (Stormwater) : Normal Operation : If level is less than le		stop pumping	g to Basin D.
500,000 Gal	lon Tank at LTRF _: Normal Operation: If level is greater tha _: If level is less than 6	n 11 feet, increase tre feet, decrease or stop	eatment, haul hauling/ rec	ing, or recirculation. irculation.
Effluent Pond	f : Normal Operation. : If level is 6 inches or : If level is greater than	less, stop irrigation/ r	ecirculation/h	auling lation/hauling.
If Yes: Cont	noff of effluent to stormy act supervisor immediate spray irrigation immedia Runoff Type	vater basins? (Yes No		•
	Severe Moderate Minor	A B C	•	
omments/Rer 	nedial Action:			

ate:	1-18-95				
nspector:	M. MATTher	ي هـ	Rainfall:	34	
· ·	e IV s Riser Phase IV below 2' Yes In compliance. No : Increase leacha	ate removal rec	quired.	A181 7-2	
1	r Phase IV s Piezometer Phase IV be (es: In compliance.) lo: Increase leacha Contact superv	low 27.6 inche	es (2.3 feet)? Quired.		
Sump No.	4 Phase VI (Stormwate  : Normal Operation : If level is less than	·	hase IV, stop	pumping to Ba	sin D.
- - Effluent Po	Sallon Tank at LTRF  : Normal Operation. : If level is greater th : If level is less than  ond : Normal Operation. : If level is 6 inches of the second of t	6 feet, decreas	se or stop haul	ing/ recirculati	on.
Observed i	unoff of effluent to storm	<del></del>			
	ontact supervisor immedia		ide the follow	ing informatior	``\ 1:
	Runoff Type Severe Moderate Minor	To Basi A B C		·	
omments/F ·	Remedial Action:				
	·				
		<del></del>			
	<u> </u>		· · · · · · · · · · · · · · · · · · ·	<del>-</del>	

Date:	1-17-51			
nspector:	M. MATTher	2.0	Rainfall:	X , 6
Y	e IV s Riser Phase IV below 27 es: In compliance. o: Increase leachat Contact supervis	te removal re	quired.	
Y	Phase IV Piezometer Phase IV beloes: In compliance. o: Increase leachat Contact supervis	le removal rei sor immediate	quired.	·
	Phase VI (Stormwater) : Normal Operation : If level is less than le	}		
	allon Tank at LTRF  : Normal Operation. : If level is greater tha : If level is less than 6	n 11 feet, ind feet, decrea	crease treatme se or stop haul	nt, hauling, or recirculation. ing/ recirculation.
Effluent Por	nd  : Normal Operation.  : If level is 6 inches or  : If level is greater than	less, stop im n 4 feet, incr	igation/ recircu	ulation/hauling recirculation/hauling.
If Yes: Cor	inoff of effluent to stormy stact supervisor immediate p spray irrigation immedia	water basins? elÿ.	(Yes (No)	•
	Runoff Type Severe Moderate Minor	To Bas	in C	
omments/Re	emedial Action:			
				·
		······································		

ate:	1-16.95		
spector:	M. MATTher	Rainfall	
Y	Riser Phase IV below 27.1es: In compliance. o: Increase leachate	e removal required.	·
	Contact supervis	or immediately.	
Y	Phase IV Piezometer Phase IV beloes In compliance. Increase leachate Contact supervise	e removal required.	et)7
	Phase VI (Stormwater) : Normal Operation : If level is less than le	vel in Riser Phase IV, :	stop pumping to Basin D.
	allon Tank at LTRF : Normal Operation. : If level is greater than : If level is less than 6	n 11 feet, increase tre feet, decrease or stop	atment, hauling, or recirculation. hauling/ recirculation.
Effluent Por	Normal Operation. : If level is 6 inches or		ecirculation/hauling ation/ recirculation/hauling.
Observed ru	noff of effluent to stormw	rater basins? (Yes/No	D
If Yes: Cor	ntact supervisor immediate p spray irrigation immediat	ilý.	•
	Runoff Type Severe Moderate Minor	To Basin A B C D	
omments/Re	emedial Action:		
			·

ate:	7-15-95				
rspector:	M. MATThe	<u>אר</u> Raii	nfall: _	Х.9	
Ye	Riser Phase IV below 23 es: In compliance.  D: Increase leacha				
Ye	Piezometer Phase IV beles: In compliance.				
Sump No. 4	Phase VI (Stormwate : Normal Operation : If level is less than		IV, stop pun	nping to Basin D.	
	Ilon Tank at LTRF : Normal Operation. : If level is greater th : If level is less than	an 11 feet, increase 6 feet, decrease or	e treatment, stop hauling/	hauling, or recirculation	on.
Effluent Pon		). or less, stop irrigatio	n/ recirculati	on/hauling	
Observed rui	noff of effluent to storm	<del></del>	<del></del>		•
	tact supervisor immedia		ne following i	nformation:	
	Runoff Type Severe Moderate Minor	To Basin A B C D			
omments/Re	medial Action:				
·				· · · · · · · · · · · · · · · · · · ·	
		<del></del>	. <del></del>	<del></del>	

Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes : In compliance.  No : Increase leachate removal required. Contact supervisor immediately.  Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches (2.3 feet)?  Yes :: In compliance.  No :: Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater) : Normal Operation :: If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF : Normal Operation. :: If level is greater than 11 feet, increase treatment, hauling, or recirculation. :: If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond : Normal Operation. :: If level is 6 inches or less, stop irrigation/ recirculation/hauling :: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Disserved runoff of effluent to stormwater basins? (Yes/Normal)  If Yes: Contact supervisor immediately, Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	ate:	7-14-95					
Yes : In compliance. No : Increase leachate removal required. Contact supervisor immediately.  Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes : In compliance. No : Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater) : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF : Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes/Normal)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	nspector:	M. MATTher	25	Rainfall:		X.3	
Is Piezometer Phase IV   Is Piezometer Phase IV below 27.6 inches (2.3 feet)?   Yes : In compliance.   No : Increase leachate removal required.   Contact supervisor immediately.	ls Y	Riser Phase IV below 27. es: In compliance. o: Increase leachat	te removal red	quired.			
: If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF  : Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes/Normal Operation)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type  To Basin  Severe  A  Moderate B  Minor  C  D	ls Y	Piezometer Phase IV beloes: In compliance. o: Increase leachat	e removal red	quired.			
: If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes/No.)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D		: Normal Operation	•	Phase IV, stop	pumping t	o Basin D.	
Normal Operation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes/Ko)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type  To Basin  Severe  Moderate  Moderate  Minor  C		: Normal Operation. : If level is greater tha	in 11 feet, ind feet, decrea	crease treatme se or stop haul	nt, hauling ing/ recirc	g, or recircula ulation.	tion.
Observed runoff of effluent to stormwater basins? (Yes/No.)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D		: Normal Operation. : If level is 6 inches or					
Runoff Type To Basin Severe A Moderate B Minor C D	If Yes: Cor	unoff of effluent to storme	water basins? ely.	(Yes/Ka)			
omments/Remedial Action:	Sto	Runoff Type Severe Moderate	To Bas A E	in C	ing inform	ation:	
	omments/Re	emedial Action:					
					-		

Riser Phase IV Is Rise Yes <u></u>	1. MATTHER	<u>ې د</u>	Rainfall:		<u> </u>
Yes <u></u>					
INO	r Phase IV below 27. : In compliance. : Increase leachate Contact supervis	e removal req	uired.		
Yes		w 27.6 inche	s (2.3 feet)? uired.		
:	se VI (Stormwater) Normal Operation If level is less than le		nase IV, stop p	umping to Ba	sin D.
:	Tank at LTRF Normal Operation. If level is greater than If level is less than 6	n 11 feet, inco feet, decreas	ease treatmen	it, hauling, or ng/ recirculati	recirculation. on.
:	Normal Operation. If level is 6 inches or If level is greater than	less, stop irrig	gation/ recircul ase irrigation/	ation/hauling recirculation/h	nauling.
Observed runoff  If Yes: Contact	of effluent to stormw supervisor immediate ay irrigation immedia	vater basins?	(Yes/No)		•
	noff Type Severe Moderate Minor	To Basir A B C D			·
omments/Remed	ial Action:				

ate: ispector:	M. MATI	Theres	Rainfall:	0	<del></del>
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Riser Pha	se IV				
	Is Riser Phase IV be	low 27.6 inches (2.	3 feet)?		
	Yes: In compl	iance.			
	No: Increase	leachate removal re	quired.		
<del></del>	Contact	supervisor immediat	ely.		
Piezomet	er Phase IV				
	Is Piezometer Phase	IV below 27.6 inch	es (2.3 feet)?		
	Yes: In compli	iance.			
•	No: Increase	leachate removal re	quired.		
	Contact	supervisor immediat	ely.		
				<u> </u>	
Sump No	. 4 Phase VI (Storr	nwater)			
	: Normal Opera	· •			
	: If level is less	than level in Riser I	hase IV, stop pu	imping to Basin D.	
500.000	Gallon Tank at LTRF				
	: Normal Opera			•	•
			ocanca trantmant	, hauling, or recircula	
	: If level is less	than 6 feet, decrea	ca or etop baulio	, naumy, or recircula of recirculation	uon.
Effluent F	: Normal Opera : If level is 6 in	ches or less, stop in	rigation/ recircula ease irrigation/ r	ation/hauling ecirculation/hauling.	
Observed	runoff of effluent to	stormwater basins	(Yes/No)		
	·			•	
If Yes: C	ontact supervisor im	mediately.			
S	top spray irrigation i	mmediately and pro-	vide the following	g information:	
	Pupoff Tupo	~ .			
	Runoff Type	To Bas			
	Severe Moderate		Α		
	Minor		3		
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ommen <del>ic</del> e	Remedial Action:				
	ricincolal Action, _				<del></del>
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ate: ispector:	M. MATThews	Rainfall:	<u> </u>
Y	e IV s Riser Phase IV below 27.6 inche es: In compliance. lo: Increase leachate remove Contact supervisor imm	val required.	
Y	Phase IV  Phase IV  Piezometer Phase IV below 27.6  In compliance.  Increase leachate remove Contact supervisor imm	val required.	
	4 Phase VI (Stormwater)  : Normal Operation : If level is less than level in F	Riser Phase IV, stop p	oumping to Basin D.
	allon Tank at LTRF  : Normal Operation. : If level is greater than 11 fer : If level is less than 6 feet, do	et, increase treatmer ecrease or stop hauli	nt, hauling, or recirculation. ng/ recirculation.
Effluent Por	nd : Normal Operation. : If level is 6 inches or less, st : If level is greater than 4 feet	top irrigation/ recircult, increase irrigation/	lation/hauling recirculation/hauling.
If Yes: Con	unoff of effluent to stormwater bantact supervisor immediately. p spray irrigation immediately and	asins? (Yes(No))	•
	Runoff Type To Severe Moderate Minor	o Basin A B C D	
omments/Re	emedial Action: <u>Alled</u>	'Supervisor	AND SCS ENGIN

Date:	7-10-95		
nspector:	M. MAThews	Rainfall:	
Ye	IV Riser Phase IV below 27.6 inch s: In compliance: Increase leachate remo Contact supervisor imn	oval required.	
Ye:	Phase IV Piezometer Phase IV below 27.0  In compliance. Increase leachate remo Contact supervisor imn	val required.	
	Phase VI (Stormwater) : Normal Operation : If level is less than level in	Riser Phase IV, stop p	umping to Basin D.
	lon Tank at LTRF _: Normal Operation: If level is greater than 11 fe _: If level is less than 6 feet, o	eet, increase treatmer Jecrease or stop hauli	nt, hauling, or recirculation.
Effluent Pond	: Normal Operation. : If level is 6 inches or less, s : If level is greater than 4 fee	stop irrigation/ recircul	ation/hauling recirculation/hauling.
. If Yes: Cont	noff of effluent to stormwater bact supervisor immediately. spray irrigation immediately ar	pasins? (Ye (No)	٠,
	Runoff Type Severe Moderate Minor	To Basin  A B C D	
Comments/Ren	medial Action: <u>CAIled</u>	Superviso	r ADD SCS FAGIN

ate:	1-9-95				
spector:	M. MATThe	205	Rainfall:		
Ye	IV Riser Phase IV below 27 s: In compliance: Increase leacha Contact superv	ite removal req	uired.		
Ye:	Phase IV Piezpmeter Phase IV bel s 2/2: In compliance. Increase leacha Contact supervi	te removal req	uired.		
	Phase VI (Stormwater : Normal Operation : If level is less than I	•	hase IV, stop (	oumping to Ba	sin D.
500,000 Gal 	lon Tank at LTRF : Normal Operation. : If level is greater that: : If level is less than 6	an 11 feet, inc 5 feet, decreas	rease treatmer e or stop hauli	nt, hauling, or	recirculation.
Effluent Pond		r less, stop irri	gation/ recircu	lation/hauling	
If Yes: Cont	off of effluent to storm act supervisor immediat spray irrigation immedia	water basins?	(Yes/No)		•,
•	Runoff TypeSevereModerateMinor	To Basin A		gomatoli	•
omments/Rer ·	nedial Action:				
			·		·

ate:	7-8-95				
spector:	M. MATThor	o L	Rainfall:		
Ye	IV Riser Phase IV below 27. s : In compliance. Increase leachat Contact supervise	e removal requ	uired.		
Ye No Sump No. 4	Phase IV Piezometer Phase IV belo s N/2: In compliance. Contact supervis Phase VI (Stormwater) Normal Operation	ow 27.6 inches e removal requ sor immediatel	s (2.3 feet)? uired. Y		•
		n 11 feet, incr	rease treatme	nt, hauling, or	recirculation.
	<ul><li>: Normal Operation.</li><li>: If level is 6 inches or</li><li>: If level is greater than</li></ul>	less, stop irric n 4 feet, incre	gation/ recircu ase irrigation/	lation/hauling recirculation/h	auling.
If Yes: Cont	noff of effluent to stormy tact supervisor immediate spray irrigation immedia	ely.		ng information	:
	Runoff TypeSevereModerateMinor	To Basin — A B C D			
omments/Rei ·	medial Action:				
				·	

ate:	7-7-95	·				
nspector:	M. MATThe	200	Rainfall:		0	
Y	e IV s Riser Phase IV below 2 ses: In compliance. lo: Increase leach. Contact super	ate removal rei	quired.			
Y		elow 27.6 inch	es (2.3 feet)? quired.		<u> </u>	
Sump No. 4	4 Phase VI (Stormwate : Normal Operation : If level is less than	•	hase IV, stop	pumping	to Basin D.	
	allon Tank at LTRF : Normal Operation. : If level is greater the: : If level is less than	nan 11 feet, ind 6 feet, decrea:	crease treatm se or stop had	ent, hauli uling/ recit	ng, or recircula	tion.
Effluent Por	nd  Normal Operation.  If level is 6 inches of the contraction.  If level is greater the	or less, stop irr	igation/ recirc	culation/ha	uling	
If Yes: Cor	unoff of effluent to storm ntact supervisor immedia op spray irrigation immed	nwater basins?	(Yes/No)	>	•	<u>.</u>
	Runoff Type Severe Moderate Minor	To Basi A B C				
omments/Ro	emedial Action:					
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ate:	1-6-95				
spector:	M. MATTher	<u> ک</u> ر	Rainfall:		
Ye	IV Riser Phase IV below 27. s: In compliance: Increase leachate Contact supervis	e removal rec	uired.		
Ye	Phase IV Piezometer Phase IV belo s NA: In compliance. Increase leachate Contact supervis	e removal req	uired.		
Sump No. 4	Phase VI (Stormwater) : Normal Operation : If level is less than le		hase IV, stop	pumping to Basin D	
	llon Tank at LTRF : Normal Operation. : If level is greater than : If level is less than 6	n 11 feet, inc feet, decreas	rease treatme	nt, hauling, or recircing/	culation.
Effluent Pond	: Normal Operation. : If level is 6 inches or : If level is greater than	j. less, stop irri n 4 feet, incre	gation/ recircu	ulation/hauling recirculation/haulin	g.
Observed rur	noff of effluent to stormw		<del></del>		•
If Yes: Cont	act supervisor immediate spray irrigation immedia	elý.		ing information:	
	Runoff Type Severe Moderate Minor	To Basi A B C D	n		
omments/Rer	medial Action:				
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ate:	7-5-55	<del></del>		
spector:	M. MoTheros	Rainfall:	<i>D</i>	
Riser Phase	e IV			
l:	s Riser Phase IV below 27.6 in	iches (2.3 feet)?		
Y	es : In compliance.			
ν	lo: Increase leachate re			
	Contact supervisor i	mmediately.		
Piezometer	Phase IV			
ls	s Piezogneter Phase IV below 2	27.6 inches (2.3 feet	1)7	
Y	es 20/17: In compliance.			
. 1	lo: Increase leachate re			
	Contact supervisor i	mmediately.		
<del></del>			<u> </u>	
Sump No.	4 Phase VI (Stormwater)			
	: Normal Operation			
. <u> </u>	: If level is less than level	in Riser Phase IV, st	op pumping to Basin D.	
500,000 G	allon Tank at LTRF			
,	: Normal Operation.			
	: If level is greater than 1	1 feet, increase treat	tment hauling or recircu	lation
	: If level is less than 6 fee	t, decrease or stop h	nauling/ recirculation.	iation.
Effluent Po				
	: Normal Operation.			
	: If level is 6 inches or less	s stop irrination/ rec	riculation/bauling	
-	: If level is greater than 4	feet, increase irrigat	ion/ recirculation/hauling.	
0			7	
Observed n	unoff of effluent to stormwate	er basins? (Yes/No)	)	
If Yes: Co	ntact supervisor immediately.		``\	
	op spray irrigation immediately	and provide the foll	owing information:	
	the first section in the condition	and provide the following	owing anomation.	
	Runoff Type	To Basin	•	
	Severe	A		
	Moderate	B		
	Minor	C		
		D		
	· · · · · · · · · · · · · · · · · · ·	D		
omments/R ·	emedial Action:			
			· · · · · · · · · · · · · · · · · · ·	
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nspector: M.	MATTher	0 0		
		⊈ Rainfall:		
Yes: I No: I	se IV below 27.6 inc n compliance. ncrease leachate ren Contact supervisor in	noval required.		
Piezometer Phase IV Is Piezomet Yes NA: I No: I	er Phase IV below 27 n compliance. ncrease leachate ren Contact supervisor in	7.6 inches (2.3 fee	et)?	
	(Stormwater) al Operation el is less than level i	n Riser Phase IV, s	stop pumping	g to Basin D.
: If lev	al Operation.			ing, or recirculation.
: If lev	al Operation. el is 6 inches or less, el is greater than 4 fo			
Observed runoff of ef If Yes: Contact supe Stop spray irr				·、 rmation:
N	Type evere loderate linor	To Basin — A B C D		
omments/Remedial Ad	ction:			

ate:	1-3-95	
nspector:	M. MATThe	ews Rainfall: X
Riser Phase	e IV	
ls	s Riser Phase IV below 2	27.6 inches (2.3 feet)?
Y	es: In compliance.	
N	lo: Increase leach	
<del></del>	Contact super	visor immediately.
Piezometer	Phase IV	
ls	Piezometer Phase IV be	elow 27.6 inches (2.3 feet)?
Y	es $\mathcal{P}/\mathcal{A}$ : In compliance.	
, IN	lo: Increase leach	ate removal required.
	. Contact super	visor immediately.
		:
	4 Phase VI (Stormwate	er)
	: Normal Operation	
		level in Riser Phase IV, stop pumping to Basin D.
500,000 G	allon Tank at LTRF	
	: Normal Operation.	
	: If level is greater the	nan 11 feet, increase treatment, hauling, or recirculation.
	: If level is less than	6 feet, decrease or stop hauling/ recirculation.
Effluent Por	nd	
	: Normal Operation.	
		or less, stop irrigation/ recirculation/hauling
	: If level is greater th	nan 4 feet, increase irrigation/ recirculation/hauling.
Observed ru	unoff of effluent to storn	nwater basins? (Yes/IVo)
	Stories Stories	·
If Yes: Cor	ntact supervisor immedia	ately.
Sto	p spray irrigation immed	liately and provide the following information:
	Runoff Type	To Basin
	Severe	A
	Moderate	A
	Minor	c
	· ·	D
omments/R	emedial Action:	
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		·
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ate:	M. MATTLEWS Rainfall: 0
ispector:	Rainfall:
Riser Phas	se IV
!	Is Riser Phase IV below 27.6 inches (2.3 feet)?
	Yes: In compliance.
(	No: Increase leachate removal required.  Contact supervisor immediately.
·	
	er Phase IV
1	ls Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes Lin compliance.
	No: Increase leachate removal required.
•	Contact supervisor immediately.
÷	and the second s
Sump No.	4 Phase VI (Stormwater)
00p 1.0.	: Normal Operation
_	: If level is less than level in Riser Phase IV, stop pumping to Basin D.
500,000,0	Sallon Tank at LTRF
000,000	Normal Operation.
-	: If level is greater than 11 feet, increase treatment, hauling, or recirculation.
_	: If level is less than 6 feet, decrease or stop hauling/ recirculation.
Effluent Po	and
Zijiločine i c	: Normal Operation.
-	: If level is 6 inches or less, stop irrigation/ recirculation/hauling
_	: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.
Observed	runoff of effluent to stormwater basins? (Yes No)
	·
	ontact supervisor immediately.
St	op spray irrigation immediately and provide the following information:
	Runoff Type To Basin
	Severe A
	Moderate B
	Minor C
	D
ommonts/	Pamadial Assiss.
omments/r	Remedial Action:
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	M. MATTLEWS Rainfall: 0
Riser Phas	se IV
!	Is Riser Phase IV below 27.6 inches (2.3 feet)?
	Yes: In compliance.
•	No: Increase leachate removal required.  Contact supervisor immediately.
D.	
	er Phase IV
,	Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes 296: In compliance.
ſ	No: Increase leachate removal required.
	Contact supervisor immediately.
Sump No.	4 Phase VI (Stormwater)
-	: Normal Operation
=	: If level is less than level in Riser Phase IV, stop pumping to Basin D.
500,000 (	Gallon Tank at LTRF
-	: Normal Operation.
-	: If level is greater than 11 feet, increase treatment, hauling, or recirculation
	: If level is less than 6 feet, decrease or stop hauling/ recirculation.
Effluent Po	ond
	: Normal Operation.
	Normal Operation.     If level is 6 inches or less, stop irrigation/ recirculation/hauling
	<ul> <li>Normal Operation.</li> <li>If level is 6 inches or less, stop irrigation/ recirculation/hauling</li> <li>If level is greater than 4 feet, increase irrigation/ recirculation/hauling.</li> </ul>
	Normal Operation.     If level is 6 inches or less, stop irrigation/ recirculation/hauling
Dbserved r	: Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  runoff of effluent to stormwater basins? (Yes Not
Dbserved r	: Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  runoff of effluent to stormwater basins? (Yes No)
Dbserved r	: Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  runoff of effluent to stormwater basins? (Yes Not
Dbserved r	Normal Operation.  : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  runoff of effluent to stormwater basins? (Yes (Not))  ontact supervisor immediately.  op spray irrigation immediately and provide the following information:  Runoff Type  To Basin
Dbserved r	Normal Operation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Tunoff of effluent to stormwater basins? (Yes (No))  Ontact supervisor immediately.  Op spray irrigation immediately and provide the following information:  Runoff Type  To Basin  Severe  A
Dbserved r	Normal Operation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  In the provided in the following information:    Normal Operation in the stormwater basins   (Yes (No))
Dbserved r	Normal Operation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.  It level is 9 inches or less, stop irrigation/ recirculation/hauling.
Dbserved r	Normal Operation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  In the provided in the following information:    Normal Operation in the stormwater basins   (Yes (No))
Dbserved r  If Yes: Co	Normal Operation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is 6 inches or less, stop irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/ recirculation/hauling.  It level is greater than 4 feet, increase irrigation/hauling.  It level is greater than 4 feet, increase
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### Hillsborough County

Department of Solid Waste \* P.O. Box 1110 Tampa, FL 33601

Sender's Telephone Number: 276-2905

24-Hour FAX Line - (813) 276-2960



"Together We CAN-DO It"

TO: Kin Incl

FAX: 244-6425 SUBJECT:

FROM: \_

COMMENTS (If Any):

y about the

Serving our customers with:

Residential & Commercial Collection Services • Curbside Recycling • Resource Recovery
Household Chemical Collection • Adopt-A-Road & Adopt-A-Shore
Environmental Enforcement • Yard & Wood Waste Processing • Landfill Services
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### HILLSBOROUGH COUNTY

### Florida

Office of the County Administrator
Daniel A. Kleman

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August 4, 1995

Senior Assistant County Administratur Patricia Bean

Assistent County Administrators Edwin Hunacher Cresse Johnson Janunis Keel Robert Taylos

Mr. Kim Ford, P.E.
Solid Waste Permitting
Florida Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

RE: Southeast County Landfill - Leachate Management

Dear Mr. Ford:

As discussed during our August 1, 1995 meeting concerning the Southeast County Landfill (Landfill), the Hillsborough County Department of Solid Waste (DSW) is submitting the installation plan and drawings (hand delivered separately by SCS Engineers) for construction of the new Temporary Pump Station No. 5 in Phase IV of the Landfill.

Although the same information is being provided as part of the DSW's response to the Florida Department of Environmental Protection's (DEP) most recent request for additional information for the permit renewal, the DSW is also presenting the plan separately to facilitate the timely construction of the new temporary pump station.

Specifically, the DSW is requesting that the DEP advise the DSW of any objections and/or recommended changes to the proposed concept so that the DSW may proceed to address the leachate management issue in Phase IV.

Once the DEP's concurrence is received, the DSW intends to immediately proceed to implement the plan and, barring any unforeseen circumstances, to have the system installed and pumping within three weeks. As indicated in the attached plan, the DSW will monitor the time meter to calculate the leachate quantity removal separately for Temporary Pump Station No. 3 and Temporary Pump Station No. 5.

Mr. Kim Ford August 4, 1995 Page Two

Please contact me at 276-2908 should you need any additional information or have any questions concerning this submittal.

Sincerely,

Patricia V. Berry

Landfill Services Section Manager

Department of Solid Waste

### Attachment

xc: Matt Matthews, DSW Larry Ruiz, SCS Steve Morgan, DEP Paul Schipfer, EPC Leviconmental Consultants

301.7315 Engliway 303 Plante 506-200 | **8**13 | 15 | 1**3**4

fangas, 11-302/19 22/17

### SCS ENGINEERS

August 3, 1995 File No. 0990018.35

Ms. Patricis V. Berry Hillsborough County Department of Solid Waste P.O. Box 1110 Tamps, Florids 33601

Subject:

Installation Plan for the Temporary Pump Station No. 5 in Phase IV

at the Southeast Landfill, Hillsborough County, Florida

#### Dear Patty:

On August 1, 1995, a meeting was held with the Hillsborough County Department of Solid Waste (HCDSW), the Florida Department of Environmental Protection (FDEP), and SCS Engineers (SCS). The purpose of the meeting was to discuss the status of the pending permit application for the Southeast County Landfill (SELF) and present to the FDEP the three alternatives evaluated by SCS to lower the leachate depth in the low spot in Phase IV. The alternatives presented were as follows:

- Alternative 1. Install a pump in Phase IV with suction line into the low spot.
- Alternative 2. Install a well point and pump near existing leachate collection header with submersible pump.
- Alternative 3, install a new pump station at the projected low point in Phase IV, connected to the existing leachate collection hooder with a submersible pump.

Based on SCS's recommendation to proceed with Alternative 1 (see drawing strached), the FDEP requested that the HCDSW submit a construction plan for approval. This letter provides the HCDSW with guidance for the installation of Alternative 1 (pump and suction line in Phase IV) to increase leachate withdrawal from the low spot.

SCS recommends that the HCDSW consider the following phased procedures to install the new temporary pump and the suction line in Phase IV.

- After approval from the Florida Department of Environmental Protection (FDEP), excavation should begin to locate the existing perimeter tee connection of the 8-inch diameter leachate header pipe that passes through the low spot under Phase IV (See plan on the attached drawing).
- Once the header is located, it should be checked to ensure that there are no
  obstructions for a distance between 100 to 130 feet within the 8-inch
  diameter leachate header (See Section A).
- If no obstructions are found, the 4-inch diameter suction line should be installed into the 8-inch diameter header to a distance between 100 to 130 feet (See Section A and detail 4). If the installation is successful, the new

Ms. Patricia V. Berry August 3, 1995 Page 2

pump should be ordered. The pump capacity (150 gallons per minute @ 18 feet suction-lift) was selected to provide an adequate removal rate based on the expected leachate generation in the landfill and without exceeding the average field suction-lift of 25 feet.

The concrete pad should be installed for the new pump and the discharge connections (valves and flowmater) should be connected to the existing 6-inch diameter forcemain leading to the main leachate pump station (See details 1, 2, 3 and 5).

While the HCDSW is waiting for the permanent pump to arrive, a temporary pump can be connected to the suction and discharge lines to begin leachate withdrawal from the low spot. The proposed in-line flow mater will measure leachate removal quantities for both the proposed Temporary Pump Station No. 5 and the existing Temporary Pump Station No. 3. The existing time meter in the existing Temporary Pump Station No. 3 will be monitored so that leachate quantity removal can be monitored separate for both pumps:

If you have any questions, please do not hesitate to call.

Very truly yours.

Larry E. Ruiz

Senior Project Engineer

Robert B. Gardner, P.E.

Vice President

**8CB ENGINEERS** 

RBG/LER:ler Enclosures

#### 1995 YEAR TO DATE LEACHATE BALANCE SUMMARY SOUTHEAST COUNTY LANDFILL HILLSBOROUGH COUNTY, FLORIDA

		Leachate Arriving at LTRF		Leachate/E	Inflow/Outflow Balance For LTRF						
		Leachate	Total Leach. Hauled	each. Hauled Total Eff. Lead		I Leach. Hauled Total Eff. Leachate Rec. Effluent		Effluent	Total Inflow	Total Outflow	Balance
	Rainfall	Pumped to LTRF	From LTRF	Hauled	From LTRF	Rec.	Sprayed	To LTRF	From LTRF	For Month	
Month	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	
Jan	4.60	3,104,000	3,166,000	(1) 0	0	0	0	3,104,000	3,166,000	(62,000)	
Feb	2.40	4,063,000	2,942,000	(1) 0	o	0	650,000	4,063,000	3,592,000	471,000	
March	1.90	3,467,000	2,320,000	(1) 0	0	113,000	932,000	3,467,000	3,365,000	102,000	
April	1.60	2,625,000	1,124,000	393,000	60,000	0	700,000	2,625,000	2,277,000	348,000	
May	2.40	2,302,000	865,725	652,689	0	0	1,000,270	2,302,000	2,518,684	(216,684)	
June	8.30	2,311,000	904,543	758,000	0	0	568,520	2,311,000	2,231,063	79,937	
			_			<u>-</u>					
YTD Total	21.20	17,872,000	11,322,268	1,803,689	60,000	113,000	3,850,790	17,872,000	17,149,747	722,253	

#### Notes:

- 1. Effluent quantities not measured separately.
- 2. If the effluent bypass is ever used to pump effluent back to the LTRF, this table must be modified.

D.E.P. AUG - 1 1995 HILLSBOROUGH COUN

Florida

Office of the County Administrator Daniel A. Kleman



Department of Environmental Protection
SOUTHWEST-DISTRIC Administrator
Patricia Bean

Assistant County Administrators Edwin Hunzeker Cretta Johnson Jimmie Keel Robert Taylor

BOARD OF COUNTY COMMISSIONERS

Dottie Berger
Phyllis Busansky
Joe Chillura
Chris Hart
Jim Norman
Ed Turanchik

Sandra Helen Wilson

July 24, 1995

Mr. Kim Ford, P.E. Solid Waste Permitting Florida Department of Environmental Protection 3804 Coconut Palm Drive Tampa, Florida 33619

RE: Southeast County Landfill - Leachate Management

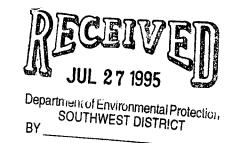
Dear Mr. Ford:

In accordance with the Hillsborough County Department of Solid Waste's (DSW) Leachate Management Plan for the Southeast County Landfill (Landfill), the DSW is providing the Landfill's Water Balance Report Form for June 1995 and a portion of July 1995. In addition, the DSW is providing the June 1995 effluent and leachate field data forms for the Landfill and the daily leachate and collection system evaluation reports.

This information is being provided to the Florida Department of Environmental Protection (DEP) and the Hillsborough County Environmental Protection Commission as an update on the DSW's leachate management efforts for the Landfill. This information is being provided in response to both the permitting and enforcement issues at hand.

As you will note, the July 1995 data reflects the change in estimating the maximum depth over the liner from the level in the Phase IV riser to the level in the newly constructed piezometer in Phase IV. Attached, for you information, is an interdepartmental memorandum outlining events which have occurred following the DSW's installation of the suction hose and pump in Pump Station No. 3 and which have interfered with the pumping of the suction pump. Also of significance is the amount of rainfall which occurred during the period from July 13, 1995 through July 21, 1995. These events have limited the DSW's ability to consistently operate the suction pump to determine the impact of the pumping activity on the piezometer leachate level.

Mr. Kim Ford July 24, 1995 Page Two



Should you have any questions concerning the information provided, please call at 276-2908.

Sincerely,

Patricia V. Berry

Landfill Services Section Manager

Department of Solid Waste

### Attachments

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

#### LEACHATE WATER BALANCE REPORT FORM JULY 1995

#### SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

	~	·. II	·		IV	V	VI	VII	VIII	IX	X	XI	XII	XIII	XIV	XV	XVI 💆
1				ŀ		Est. Depth		Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Total	
ı		Area			Effluent	Over	Landfill	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir-	Effluent	Landfill
		(acres)		Rainfall		Liner	Storage	to LTRF	Tank	at LTRF	. Hauled	culation	Storage	Sprayed	culation	Hauled	Evapor.
Day	final	active		(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)
1	23.2	5.0						74,000	374,000		0	0	42,000	Ö	0	31,000	0
2	23.2	5.0				NR	NR	NR	NR	45,415	0	0	NR	0	0	0	0
3	23.2	5.0		0.1				163,000	403,000	44,890	43,549	0	61,000	44,200	0	37,000	36,000
4	23.2	5.0		0.0			NR		NR	44,965	0	0	65,000	0	0	0	0
5	23.2	5.0		0.0				128,000	403,000	45,585	37,632	0	61,000	42,250	0	37,000	34,000
6	23.2	5.0	92.2	0.0				117,000	432,000	44,865	43,431	0	61,000	42,250	0	31,000	34,000
7	23.2	5.0	92.2	0.0				50,000	374,000	45,590	62,287	0	55,000	42,250	0	31,000	34,000
8	23.2	5.0	92.2	0.0				51,000	374,000	45,070	6,200	0	49,000	0	0	44,000	<u> </u>
9	23.2	5.0	92.2	0.0		NR	NR	NR	NR	45,070	0	0	NR	0	0		
10	23.2	5.0	_	0.0				169,000	403,000	45,065	50,274	0	102,000	42,250	0		34,000
11	23.2	5.0	92.2	0.0		58.0		79,000	374,900	45,160	62,308	Ö	85,000	42,250	0		34,000
12	23.2	5.0	92.2	0.0		58.0		50,000	317,000	45,103	62,132	0	75,000	36,900	0		30,000
13	23.2	5.0	92.2	2.2		58.0	9,649,000	41,000	288,000	45,045	25,041	ō	65,000	0	0	0.7000	0
14	23.2	5.0	92.2	0.3	20.0	58.0	9,649,000	70,000	288,000	45,315	24,900	0	61,000	0	0		0
15	23.2	5.0	92.2	0.0		58.0	9,649,000	35,000	259,000	45,360	18,756	0	75,000	0	0		0
16	23.2	5.0	92.2	0.0		58.0	9,649,000	74,000	288,000	45,000	0	0	71,000	27,400	0	00,000	22,000
17	23.2	5.0	92.2	0.6		59.0	10,112,000	6,000	230,000	45,000	18,697	ō	116,000	0	1 0		0
18	23.2	5.0	92.2	3.4	35.0	60.0	10,576,000	35,000	202,000	44,900	18,600	Ō	113,000	0	0		0
19	23.2	5.0	92.2	1.5	34.0	59.0	10,112,000	86,000	230,000	45,135	12,400	0	109,000	ő	0	75,000	0
20	23.2	5.0	92.2	0.2	33.0	58.0	9,649,000	99,000	259,000	45,253	24,982	ō	106,000	0	0	68,000	0
21	23.2	5.0		1.8	33.0	59.0	10,112,000	42,000	230,000	45,370	24,973	Ö	106,000	0	0	68,000	0
22					NR	NR	NR			NR			NR		NR	00,000	0
23				NR	NR	NR	NR	NR	NR	NR			NR		NR	0	0
24			NR	NR	NR	NR	NR	NR	NR	NR			NR		NR	0	0
25				NR		NR	NR	NR	NR	NR			NR		NR	0	0
26		NR	NR	NR	NR	NR	NR	NR		NR			NR		NR	0	0
27					NR	NR	NR	NR		NR			NR		NR	0	0
28						NR	NR	NR	NR.	NR			NR		NR	0	0
29						NR	NR	NR	NR	NR .			NR		NR	0	
30			NR	NR	NR	NR	NR	NR	NR	NR			NR		NR	- 0	(
31	NR	NR	NR	NR	NR	NR	NR	NR	NR	NR			NR		NR	- 0	0
<b></b>										1					ING		
Total				10.10	471.0	799.0	125,388,000	1,369,000	5,728,000	948.141	536,162	. 0	1,478,000	319,750	0	775,000	258,000
Daity Avg				0.48	24.8	44.4		65,000	318,000	45,000	34,000	0	78,000	40,000	0	46,000	32,000
											9 .,000 ]		70,000 [	40,000			32,000 ]

#### Notes:

- 1. NR = No Records.
- 2. Column II, total area with waste is 120.4 acres (Phases I-IV).
- 3. Columns III and IV, field measured. Column III, Trace is less than 0.01 inches and is not included in total.
- 4. Column V, estimated from depth in: Before 7/10/95 Phase IV riser and after 7/10/95 Phase IV Piezometer.
- 5. Column VI, estimated from Column V and approximate volume with top of clay elevation at: Before 7/10/95 118.5 feet and after 7/10/95 117.0 feet.
- 6. Column VII, calculated from Column IX + Column X + Change in Storage of 500,000 gal. tank.
- 7. Column VIII, calculated from depth in 500,000 gal. leachate tank.
- 8. Columns IX and XIII, quantities from flow meters.
- 9. Columns X, XI, XIV, and XV, quantities calculated from truck weight.
- 10. Column XVI, 80.8% of the daily values from Columns XI, XIII and XIV.
- 11. Values in italic are substitute for missing data and are based on averaged values.

7-95BAL.WB2 Revised by LER, 7/24/9

### LEACHATE WATER BALANCE REPORT FORM JUNE 1995

SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

1		Ш		111	15.7					HILLSBOROUG	H COUNTY, I	-L					
<del></del>		- !!-			IV I Dooth in	V Darek	VI	VII	VIII	IX IX	X	XI	XII	XIII	XIV	XV	XVI
1		Area		i		Est. Depth		Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Total	1
				D-:-4-1	Effluent	Over	Landfill	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir-	Effluent	Landfill
Day	final	(acres)	int.	Rainfall		Liner	Storage	to LTRF	→ Tank	at LTRF	Hauled	culation	Storage	Sprayed	culation	Hauled	Evapor.
Day	23.2	5.0		(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)
<u> </u>	23.2	5.0	92.2	0.0				117,000	317,000		43,924	0	55,000	40,900	0	25,000	33,000
	23.2	5.0	92.2	0.4				54,000	288,000	45,436	37,361	0	49,000	40,900	0	25.000	33,000
<u> </u>	23.2	5.0	92.2	0.8				70,000	288,000	44,841	24,858	0	36,000	0	0	25,000	0
	23.2		92.2			NR	NR	NR	NR	44,898	0	0	NR	0	. 0	0	0
6	23.2	5.0	92.2	1.5				214,000	374,000	45,283	37,400	0	71,000	0	0	37,000	0
	23.2	5.0	92.2	0.0				29,000	345,000	45,058	12,449	0	58,000	40,900	0	37,000	33,000
8		5.0	92.2	0.0				77,000	345,000	45,365	31,402	Ö	52,000	40,900	Ō	25,000	33,000
<u> </u>	23.2	5.0	92.2	0.0				63,000	345,000	44,895	18,594	0	58,000	40,900	0	31,000	33,000
9	23.2	5.0	92.2	0.0				64,000	345,000	44,837	18,664	0	45,000	40,900	0	37,000	33,0
10	23.2	5.0	92.2	0.0				56,000	345,000	43,203	12,500	0	30,000	0	0	12,000	00,0
11	23.2	5.0				NR		NR	NR	41,569	0		NR	0	ŏ	0	0
12	23.2	5.0	92.2	0.0	20.0			203,000	432,000	43,427	31,237	0	61,000	40,900	0	31,000	33,000
13	23.2	5.0	92.2	0.7	15.0		1,189,000	105,000	461,000	45,284	31,267	0	45,000	0	0	19,000	33,000
14	23.2	5.0	92.2	0.9			1,189,000	73,000	432,000	45,335	56,130	0	55,000	0	0	19,000	
15	23.2	5.0	92.2	0.0			1,189,000	79,000	403,000	45,430	62,140	ō	49,000	40,900	0	12,000	33,000
16	23.2	5.0	92.2	0.0		16.0	1,189,000	42,000	374,000	45,660	24,880	0	55,000	40,900	0	43,000	
17	23.2	5.0	92.2	0.0		15.0	1,115,000	70,000	374,000	45,140	24,937	0	39,000	40,900	0	19,000	33,000
18	23.2	5.0		Trace	NR	NR	NR	NR	NR	45,455	0		NR 33,000	0	- 0	19,000	
19	23.2	5.0	92.2	1.4	19.0	16.0	1,189,000	176,000	403,000	45,770	56,329	0	58,000	- 0	- 0	37,000	0
20	23.2	5.0	92.2	0.0	14.0	16.0	1,189,000	107,000	403,000	45,200	62,042	0	42,000	42,020	- 6	31,000	
21	23.2	5.0	92.2	0.0	15.0	16.0	1,189,000	66,000	374,000	45,220	49.872	0	45,000	44,600	- 0		34,000
22	23.2	5.0	92.2	0.4	18.0	16.0	1,189,000	57,000	374,000	44,980	12,492	0	55,000		0	6,000	36,000
23	23.2	5.0	92.2	Trace	20.0	16.0	1,189,000	71,000	374,000	45,470	25,053	0	61,000	0	0	25,000	0
24	23.2	5.0	92.2	0.0	14.0	16.0		58,000	374,000	45,230	12,328	- 0	42,000	0		38,000	0
25	23.2	5.0	92.2	1.3	NR	NR			NR	45,060	12,328	- 0		0	<u> </u>	62,000	0
26	23.2	5.0	92.2	0.9	25.0	16.0		185,000	432,000	44,955	37,434	- 0		0	0	0	0
27	23.2	5.0	92.2	0.0	23.0			60,000	403,000	45,455	43,795	- 0	78,000	0	0	31,000	0
28	23.2	5.0	92.2	0.0	20.0		.,	108,000	403,000	44,985	62,658		71,000	0	0	19,000	
29	23.2	5.0	92.2	0.0	20.0			73,000	374,000	45,175			61,000	44,200	0	31,000	36,000
30	23.2	5.0	92.2	0.0	18.0			34,000	345,000	44,450	56,157	0	61,000	44,000	0	31,000	<u>36,0</u> 00
							.,204,000	34,000	345,000	44,450	18,640	0	55,000	25,600	. 0	50,000	21,0
				-			·			<del>- ;  </del>		- <del></del>					
Total				8.30	455.0	414.0	30,767,000	2,311,000	0.727.000	1 047 704							
Daily Avg				0.28	17.5	15.9			9,727,000	1,347,734	904,543	0	1,387,000	568,520		758,000	460,000
<u> </u>	<del></del>			<u> </u>	17.51	13.3	1,103,000	77,000	324,000	45,000	35,000	0	53,000	41,000		29,000	33,000

#### Notes:

- 1. NR = No Records.
- 2. Column II, total area with waste is 120.4 acres (Phases I-IV).
- 3. Columns III and IV, field measured. Column III, Trace is less than 0.01 inches and is not included in total.
- 4. Column V, estimated from depth in Phase IV riser.
- 5. Column VI, estimated from Column V and approximate volume with top of clay elevation at 118.5 feet,
- 6. Column VII, calculated from Column IX + Column X + Change in Storage of 500,000 gal, tank.
- 7. Column VIII, calculated from depth in 500,000 gal. leachate tank.
- 8. Columns IX and XIII, quantities from flow meters.
- 9. Columns X, XI, XIV, and XV, quantities calculated from truck weight.
- 10. Column XVI, 80.8% of the daily values from Columns XI, XIII and XIV.
- 11. Values in italic are substitute for missing data and are based on averaged values.

6-95bal.wb2 Revised by LER, 7/21/95.

### HILLSBOROUGH COUNTY

### Florida

Office of the County Administrator
Daniel A. Kleman

BOARD OF COUNTY COMMISSIONERS

Dottie Berger
Phyllis Busansky
Joe Chillura
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Jim Norman
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Senior Assistant County Administrator Patricia Bean

Assistant County Administrators
Edwin Hunzeker
Cretta Johnson
Jimmie Keel
Robert Taylor

### MEMORANDUM

DATE:

JULY 18,1995

TO:

Patricia V. Berry, Executive Manager

FROM: Well Meredith Matthews, Senior Engineer Tech.

SUBJECT:

Sump # 3

On 7/13/95 a 3" hose (with pump) was inserted into the 8" Leachate line at sump #3 (as a test) to assist with Leachate removal from the Landfill. On 7/14/95 we encountered electrical problems between sump #3 and the main pump station, at that time sump #3 was put on 2 hours pumping, 6 hours off until 7/17/95. On Monday 7/17/95 we had a total electrical outage at the Landfill for approximately 9 hours. Sump #3 was off from 10 a.m. 7/17 till 12 noon 7/18 due to power outage and contractor looking for electrical problems. At 12 noon 7/18 sump #3 was placed in manual operation until electrical problem is solved. The main pump station will be maned 24 hours a day by county and contractor employees to monitor for problems.



Department of Environmental Protection SOUTHWEST DISTRICT

### LEACHATE DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Year) Sune, 1995

	Sump No. 3	(1) Phase IV Riser	(1) Phase IV Piezometer	Phase III		Depth in	Storage	Leachate	Hauled	Leachate	<u> </u>	T
Date	(inches)	(inches)	(Inches)	Riser	Sump No. 4		500K Tank	Contractor	County	Recirculation	Rainfall	
00.0				(inches)	(Inches)	(foot)	(gallons)	(gallons)	(gallons)	(gallons)	(inches)	Initia
1	12	16		3	54	11	330K	25 089	18 835	-	0	
2	12	16		4	53	10	300 K	24.961	12,400		.4	
3	12	16			56	10	300K	24.858			.8	<u> </u>
4	12			<u> </u>							0	<u> </u>
5	12	16		3	60	13	390K	24 917	12, 483		1, <	
6	12	16		3	60	12	360 K	12,449	, , , , , ,		0	
7	12	15		3	66.	12	340 K	31.402			0	
8	12	14		3	65	12	360 K	18, 594			0	
9	12	16		3	65	12	360 K	18.664			0	
10	12	16	-	3	65	12	360 K	12,500			0	
11	12			_							-	
12	12	15	ļ	3	53	15	450K	31.237			Trace	<del></del>
13	12	16	_	3	59	16	480K	31.267			.7	
14	12	16	_	3	66	15	450K	56.130			9	
15	12	16		3	59	14	420 K	62,140			0	
16	12	16	_	3	49	13	390 K	24.880			0	
schale Ha	uled Subtota	1			· · · · · · · · · · · · · · · · · · ·	<del></del>				<del></del>		
K death is	graniar ib	27 6 lask					Evaluation Report Form	<u> </u>		<del> </del>		

·	, ,			
Comments:			÷	
		<u> </u>		
	<del> </del>	· · · · · · · · · · · · · · · · · · ·		<del></del>

### LEACHATE DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

/// /L B/		
(Month/Year)		
(	 -	

			(1) Phase IV	Phase III		Depth in	Storage	Leachate	Hauled	Leachate		
	Sump No. 3	i	Piezometer	Riser	Sump No. 4	500K Tank	500K Tank	Contractor	County	Recirculation	Rainfall	
Date	(inches)	(inches)	(inches)	(inches)	(Inches)	(feet)	(gallons)	(gallons)	(gallons)	(gallons)	(inches)	Initials
17	12	15		3	60	13	390 K	24,937			0	
18	12					_		-				
19	12	16	_	3	59	14	420K	37,610	18.719		1.4	
20	12	16	_	3	58	14	420K	43,442	18,600		0	
21	12	16	-	3	59	13	390K	31,194	18,678		0	
22	12	16		3	59	13	390K	12,492			.4	
23	12	16		4	60	13	390 K	25,053		······································	Trace	
24	12	16		3	64	13	390K	12,328			0	
25	12			·-				1			1.3	
26	12	16		3	60	15	450K	37.434			.9	
27	12	16		4	60	14	MYOK	31. 232	12,563	<del>, , , , , , , , , , , , , , , , , , , </del>	0	<del></del>
28	12	16		4	59	14	420K	43,932	18,726		0	
29	12	16		4	59	13	390K	37,232	18,925		0	
30	12	17		5	68	12	360K	18,640			0	
31							\$ \$		:			
achate Ha	uled Subtota	l.										

(1) it deput is greater than 27.6 inches (2.3 feet):	Contact Supervis	or immediately. Co	mplete Evaluation Report F	orm.	•	
Comments:	<u> </u>	_				
		•				
All the space of						
Leachate Hauled Month Total:	<del></del>	·				

### EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Year) Sure, 1995

	Depth in		Treated	i		Treated	Treated		(1) Effluent	
	Effluent	Leachate	Effluent	Treated Efflu	uent Hauled	Effluent	Effluent	Time at	Runoff to	
[	Pond	Treated	Sprayed	Contractor	County	Recirculation	Stored	End of	Retention	
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	Rainfall	Area (Y/N)	Initials
1	18	44.668	40,900	24,849			3,768	-	$\mathcal{N}$	
2	16	45,436	40,900	24,752	· .		4,536		N	
3	12	44841	<del>'</del>	24 969			44,841		_	
4		44,898					44,898			
5	23	45,283		37,260			45,283			
6	19	45,058	40,900	37.349			4,158		\mathcal{n}	····
. 7	17	45.365	40,900	24.610			4,465		N	13
8	19	44.895	40,900	30,921			3 995		N	, <del>. , , , </del>
9	15	44,837	40,900	37,225		·	3,937		N	<del>,</del>
10	10	34,972		12 356	<u> </u>		34,972			
11	<del></del> .	41,569					41.569			
12	20	13,828	40,900	31,073					N	
13	15	45,284		18,600			45,284	AM		
14	18	45,335		18,600			45,335		_	
15	16	45,430	40,900	12,400			4,530		N	
16	18	45,660	40.900	43,305			4,760		N	

(1) 11 ) 001 001 11 11 11 11 11 11	or minimalization and otop opiny migation. Comple	to Evaluation Ropoliti onth	
Comments:	<u>-</u>		 
	<u> </u>		

## SOUTHEAST COUNTY LANDFILL (Month/Year)

	Depth in Effluent	Leachate	Treated Effluent	Treated Efflu	ent Hauled	Treated Effluent	Treated Effluent	Time at	(1) Effluent	-
	Pond	Treated	Sprayed	Contractor	County	Recirculation	Stored	End of	Retention	
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	Rainfall	Area (Y/N)	Initials
17	13	45 140	_	18.722			45,140			
18		14.685	_				14.685			<u> </u>
19	19	45,770		37,389	į.	·	45,770			•
20	14	45,200	42,020	30 944			3,180		N	
21	15	45 220	44.600	6,259			620		<i>N</i>	
22	18	44.980	¥ —	24,970			44,980		_	
23	20	45,470		37 832			45,470			4
24	14	45,230		61.533			45,230		_	
25		45.060	_				45,060		_	
26	25	44.955		30,948			44,585		_	
27	23	45,455	11.	18,711			45,455			
28	20	44.585	44,200	31,073			785		N	<del></del>
29	20	45, 175	44,000	31,110			1175		N	
30	18	44,450	25,600	49.688	* * *		18,850		$\sim$	
31				(d)	<u> </u>					

(1) If yes: Cor	tact Supervisor immediately and stop spray Irrigation. Complete Evaluation Report	Forn	η.				
Comments:		; }					
		1.	·	•			
	·	1			,		

Date:	6.30-95				
nspector:	M. MATThew.	\$	Rainfall:		
Riser Phase	• 1V	<del></del>	· · · · · · · · · · · · · · · · · · ·	<u>.</u>	
	Riser Phase IV below 27.	6 inches 12 3	feet12		
Y	es : In compliance.	.0 11101165 (2.5	166()1		
N	o: Increase leachat	e removal reo	uired.		
	Contact supervis				
Piezometer					
ls	Piezgmeter Phase IV belo	ow 27.6 inche	s (2.3 feet)?		
Y	es 2/17: In compliance.				
, N	o: Increase leachat				•
	Contact supervis	sor immediate	ly.		·
Sump No. 4	4 Phase VI (Stormwater)	1			
	: Normal Operation			•	
<del></del>	: If level is less than le	vel in Riser P	hase IV. ston	numping to Basi	in D
Effluent Por	nd : Normal Operation. : If level is 6 inches or : If level is greater that				aulino.
Observed ru	unoff of effluent to stormy			100110011011	· .
•		Tutor Dosnior	(100)		٠,
If Yes: Con	ntact supervisor immediate	ely.			•
	p spray irrigation immedia		ide the follow	ng information:	
	Runoff Type	To Basi	n		
	Severe	A			ĺ
	Moderate Minor	· — B		•	
	Wilhor	c			i
	<u> </u>	D		· · · · · · · · · · · · · · · · · · ·	
4 - 10	d'-( A -4''			•	
omments/R	emedial Action:		<del></del>		<del></del>
	····	·			
				1	
					•

)ate:	6-29-95					
spector:	M. MATThe.	202	Rainfall:	0		<del></del>
Υe	Riser Phase IV below 2 es: In compliance.  o: Increase leach	ate removal rec	quired.			
D:	Contact super	visor immediate	ely.	<del></del>	<u></u>	· · · · · · · · · · · · · · · · · · ·
Ye	Phase IV Piezometer Phase IV bees DA: In compliance. Increase leach Contact super	ate removal rec	quired.			
	Phase VI (Stormwate: Normal Operation _: If level is less than		hase IV, stop	pumping to	Basin D.	
Effluent Pon	: Normal Operation. : If level is 6 inches	6 feet, decreas	se or stop had	ling/ recircul	ation.	tion.
Effluent Pon	: If level is greater the : If level is less than designed : Normal Operation. : If level is 6 inches the : If level is greater the :	6 feet, decreas or less, stop irri aan 4 feet, incre	igation/ recirc	ling/ recircul	ation.	tion.
Effluent Pon	: If level is greater the second of the seco	or less, stop irrinan 4 feet, increasenwater basins?	igation/ recircease irrigation	ling/ recircul ulation/hauli / recirculatio	ation. ng n/hauling.	tion.
Effluent Pon	: If level is greater the : If level is less than id : Normal Operation. : If level is 6 inches in the : If level is greater the configuration of effluent to storm tact supervisor immedia	or less, stop irrinan 4 feet, increasenwater basins?	igation/ recircease irrigation (Yes(10)) ide the follow	ling/ recircul ulation/hauli / recirculatio	ation. ng n/hauling.	tion.
Effluent Pon  Observed ru  If Yes: Con Stop	: If level is greater the : If level is less than it is less than it is less than it is less than it is greater the is greater the is greater than it is greater than	or less, stop irritan 4 feet, increase newater basins?  ately.  To Basi  A B C	igation/ recircease irrigation (Yes(10)) ide the follow	ling/ recircul ulation/hauli / recirculatio	ation. ng n/hauling.	tion.
Effluent Pon  Observed ru  If Yes: Con Stop	: If level is greater the: If level is less than id in the importance of the importa	or less, stop iman 4 feet, increase newater basins?  ately.  To Basi  A  B  C	igation/ recirc ease irrigation (Yes(10)	ling/ recircul ulation/hauli / recirculatio	ation. ng n/hauling.	tion.

ate:	6.28.95					
spector:	M. MATThews	R	lainfall:			<del></del>
 Riser Phase	IV					
Is	Riser Phase IV below 27.6	inches (2.3 fe	et)?			]
Y	es: In compliance.					1
N	Increase leachate				(x,y) = (x,y,y) = y	İ
<del></del>	Contact superviso	r immediately.	·.	···········		
Piezometer						
ls	Piezometer Phase IV below	/ 27.6 inches (	(2.3 feet)?			
	es N/A: In compliance.					
, 10	Increase leachate					
	Contact superviso	r immediately.	. :		-	
	3				· · · · · · · · · · · · · · · · · · ·	
Sump No. 4	Phase VI (Stormwater)					
. <u>.</u>	. Normal Operation					
<u>.                                      </u>	: If level is less than lev	el in Riser Pha	se IV, stop p	oumping to Ba	isin D.	
500 000 6						
300,000 0	Illon Tank at LTRF					1
-	allon Tank at LTRF  : Normal Operation.	in the second second participation of the second se	er ist was to keep ja	the office of the states	ko <sub>nd</sub> ari oleh distronomian T	washing to the control of
	: Normal Operation.					1
144, y - <mark></mark> 	: Normal Operation. : If level is greater than : If level is less than 6 for	11 feet, increa	ase treatmer or stop hauli	nt, hauling, or ng/ recirculat	recirculation	1
Brog Special Section	: Normal Operation. : If level is greater than : If level is less than 6 for	11 feet, increa	ase treatmer or stop hauli	nt, hauling, or ng/ recirculat	recirculation	1
Effluent Por	: Normal Operation. : If level is greater than : If level is less than 6 fo	11 feet, increa	ase treatmer or stop hauli	nt, hauling, or ng/ recirculat	recirculation	1
Effluent Por	: Normal Operation. : If level is greater than : If level is less than 6 formal : Normal Operation.	11 feet, increa eet, decrease o	ase treatmer or stop hauli	nt, hauling, or ng/ recirculat	recirculation	1
Effluent Por	: Normal Operation. : If level is greater than : If level is less than 6 for the second of the secon	11 feet, increa eet, decrease o	ase treatmer or stop hauli tion/ recircu	nt, hauling, or ng/ recirculat	recirculation	1
Effluent Por	: Normal Operation. : If level is greater than : If level is less than 6 for the series of the serie	11 feet, increase of the set, decrease of the set, stop irrigates 4 feet, increase of the set	ase treatmer or stop hauli stion/ recircuse irrigation/	nt, hauling, or ng/ recirculat	recirculation	1
Effluent Por	: Normal Operation. : If level is greater than : If level is less than 6 for the second of the secon	11 feet, increase of the set, decrease of the set, stop irrigates 4 feet, increase of the set	ase treatmer or stop hauli stion/ recircuse irrigation/	nt, hauling, or ng/ recirculat	recirculation ion.	1
Effluent Por	: Normal Operation. : If level is greater than : If level is less than 6 for the series of the serie	11 feet, increase of the set, decrease of the set, stop irrigates 4 feet, increase of the set of th	ase treatmer or stop hauli stion/ recircuse irrigation/	nt, hauling, or ng/ recirculat	recirculation	1
Effluent Por	: Normal Operation. : If level is greater than : If level is less than 6 for the series of the serie	11 feet, increase of the set, decrease of the set, stop irrigated feet, increase of the set of the	ase treatment or stop haulication/ recircuse irrigation/	nt, hauling, or ng/ recirculat lation/hauling recirculation/	recirculation ion. hauling.	1
Effluent Por	: Normal Operation. : If level is greater than : If level is less than 6 for the series of the serie	11 feet, increase of the set, decrease of the set, stop irrigated feet, increase of the set of the	ase treatment or stop haulication/ recircuse irrigation/	nt, hauling, or ng/ recirculat lation/hauling recirculation/	recirculation ion. hauling.	1
Effluent Por  Observed ru  If Yes: Cor	: Normal Operation. : If level is greater than : If level is less than 6 for the series of the serie	11 feet, increase of the set, decrease of the set, stop irrigates after basins? (No. 2014)	ase treatment or stop haulication/ recircuse irrigation/	nt, hauling, or ng/ recirculat lation/hauling recirculation/	recirculation ion. hauling.	1
Effluent Por  Observed ru  If Yes: Cor	: Normal Operation. : If level is greater than : If level is less than 6 for the series of the serie	11 feet, increase of the set, decrease of the set, stop irrigated feet, increase of the set of the	ase treatment or stop haulication/ recircuse irrigation/	nt, hauling, or ng/ recirculat lation/hauling recirculation/	recirculation ion. hauling.	1
Effluent Por  Observed ru  If Yes: Cor	: Normal Operation. : If level is greater than : If level is less than 6 for the series of the serie	11 feet, increase of the set, decrease of the set, stop irrigates after basins? (No. 2014)	ase treatment or stop haulication/ recircuse irrigation/	nt, hauling, or ng/ recirculat lation/hauling recirculation/	recirculation ion. hauling.	1
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	Date:	6.27.95			•	
	Inspector:	M. MATThew	<u> </u>	Rainfall:	0	
	Riser Phase					
	Y	Riser Phase IV below 27. es: In compliance.				
	, N	o: Increase leachate Contact supervis	e removal requior immediately	ired. '.		
en was in Light tradition to general agree	Piezometer Is	Piezometer Phase IV belo	w 27.6 inches	(2.3 feet)?		
	N	es <u>N/n</u> : In compliance. o: Increase leachate Contact supervis	e removal requi or immediately	ired.		
	Sump No. 4	Phase VI (Stormwater)  : Normal Operation : If level is less than le	vel in Riser Pha	ase IV, stop po	ımping to Basin D.	
Alternative seed first consider		allon Tank at LTRF  —: Normal Operation.	n 11 feet, incre	ease treatment	, hauling, or recirculation.	griger or es
Codon de orige S	Effluent Por	and the first of the control of the state of	less, stop irrig	ation/ recircula	ition/hauling	
	Observed ru	noff of effluent to stormw	rater basins? (	Yesl		
		ntact supervisor immediate p spray irrigation immedia		e the followin	g information:	
	·	Runoff Type Severe Moderate Minor	To Basin A B C			
	Comments		<u>D</u>	· 	<u>.</u>	
		emedial Action:				
	·				,	
	•		<del>,</del>		•	

Date:	6.26.35				
nspector:	M. MATThew	<u> </u>	Rainfall:	X.9	<del></del>
Riser Phase					
	Riser Phase IV below 2	76:122	4-415		,
 Y	es : In compliance.	7.6 inches (2.3	1ee1)/		
N	lo: Increase leach	ate removal rec	uirad		
	Contact superv				
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Piezometer					
ls	Piezometer Phase IV be	low 27.6 inche	s (2.3 feet)?		
Y 1A	es P/A: In compliance.				
, 10	o: Increase leacha	ate removal req	uired.		
	Contact superv	visor immediate	ly.	•	
· · · · · · · · · · · · · · · · · · ·					
Sump No. 4	4 Phase VI (Stormwate	er)			
. <u> </u>	: Normal Operation	•			
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500 000 G	allon Tank at LTRF	•			
	Normal Operation.	• .	Same and the second states of the	to the second of the second second second second second second second second second second second second second	a gradije odskih a saboraci. T
		44 6			
-	: If level is greater th : If level is less than	ian il teet, inc	rease treatme	nt, nauling, or recir	culation.
	The second of th	o icel, decreas	e or stop nau	mg/ recirculation.	<del></del>
Effluent Por		•		•	1
	: Normal Operation.	1			ł
-	: If level is 6 inches o	or less, stop irri	gation/ recircu	lation/hauling	
	: If level is greater th	an 4 feet, incre	ase irrigation/	recirculation/hauling	ng.
Observed ru	unoff of effluent to storm	nwater hasins?	(YestNo)		
		THE COLUMN TO SHIP	1103(10)		
If Yes: Cor	ntact supervisor immedia	itely.			
	p spray irrigation immed		ide the follow	ing information:	1
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	Runoff Type	To Basi	n		l
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	Moderate	B		•	1
	Minor	c			
	·	D	·		
omments/Re	emedial Action:	· · · · · · · · · · · · · · · · · · ·		<del></del>	
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	Date:	6-23-95				
	Inspector:	M. MATTLEY	2 مسا	Rainfall:	TYACR	
	Riser Phase	Riser Phase IV below	27.6 inches	(2.3 feet)?		
	Y€	es : In complianc Increase lead Contact supe	e. :hate remova	I required.		
	Ye	Piezometer Phase IV I	e.			
	No	Contact supe	hate remova	l required. diately.		
er di sepera		Phase VI (Stormwa : Normal Operation : If level is less tha	1	er Phase IV, stop	pumping to Basin D.	
Bas eteritikas etiko		: Normal Operation	than 11 feet	, increase treatme	nt, hauling, or recirculation	j
e Armerica	Effluent Pon	d —: Normal Operation	•	Andrew and State of States		
		: If level is 6 inches : If level is greater	s or less, sto than 4 feet,	p irrigation/ recircuincrease irrigation/	lation/hauling recirculation/hauling.	
	Observed ru	noff of effluent to sto	rmwater bas	ins? (Yes/Noi)		
		tact supervisor immed spray irrigation imme		provide the followi	ng information:	-
		Runoff Type Severe Moderate Minor	To	Basin A B C		:
[	omments/Re	medial Action:		D	· · · · · · · · · · · · · · · · · · ·	
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Date:	6-22-95				
nspector:	M. MATTher	25	Rainfall:	. 4	
Riser Phase	IV				
	Riser Phase IV below 27	7.6 inches (2.3	feet)?		
Ye	s: In compliance.				
No	: Increase leacha				
<del> </del>	Contact superv	risor immediate	ly.		
Piezometer F	Phase IV				
ls l	Piezometer Phase IV bel	low 27.6 inche	s (2.3 feet)?		
Ye	s NA: In compliance.				
No	: Increase leacha				
	Contact superv	isor immediate	ly.		
<del>:</del>	+				•
	Phase VI (Stormwate	r)			
<del>_</del>	Normal Operation			_	<u>,</u> ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,
<del></del>	: If level is less than	level in Riser P	hase IV, stop	pumping to Bas	in D.
500,000 Ga	llon Tank at LTRF	ار در در در در در در در در در در در در در	The second second second second	and the second of the second	e de la companya de la companya de la companya de la companya de la companya de la companya de la companya de
	: Normal Operation.				
	: If level is greater th	an 11 feet, inc	rease treatme	nt, hauling, or r	ecirculation.
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Effluent Pon	a i lige e lagres i i la fill de de esta i i i de de de de de de de de de de de de de	mark the second	- ವೇಕಿಕ ಚಿನ್ನಾರಿಕಿಕ		And the same of th
<u></u> -	_: Normal Operation.	<b>!•</b>			
· ·	: If level is 6 inches o	or less, stop irri	gation/ recircu	lation/hauling	
	: If level is greater the	an 4 feet, incre	ase irrigation/	recirculation/h	auling.
Observed rur	noff of effluent to storm	water basins?	(Yes/No)		• .
•					٠,
	tact supervisor immedia				
Stop	spray irrigation immedi	iately and prov	ide the followi	ing information:	
	Runoff Type	To Basi	<u></u>		
	Severe	A P			
	Moderate	В		•	1
	Minor	C	· •		
		D	ı		
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omments/Re	medial Action:				
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Salar Sarah

	Date: 6-21-95	
	Inspector: MMATThews Rainfall:	
	Riser Phase IV	]
	Is Riser Phase IV below 27.6 inches (2.3 feet)? Yes : In compliance.	
to the second second second	No: Increase leachate removal required.  Contact supervisor immediately.	
	Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)?	
	Yes What: In compliance.  No: Increase leachate removal required.	
	Contact supervisor immediately.	
e y s de	Sump No. 4 Phase VI (Stormwater) : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.	A. W. Chine
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	<ul> <li>Normal Operation.</li> <li>If level is greater than 11 feet, increase treatment, hauling, or recirculation.</li> <li>If level is less than 6 feet, decrease or stop hauling/ recirculation.</li> </ul>	), y, 4,4 %,
ar sika segera si kasego. Para	Effluent Pond  : Normal Operation.	enter a service de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company de l'accessor de la company
*	: If level is 6 inches or less, stop irrigation/ recirculation/hauling: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.	
	Observed runoff of effluent to stormwater basins? (Yes/No)	
• · · · · · · · · · · · · · · · · · · ·	If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:	-
	Runoff Type To Basin Severe A	
	Moderate B C D	
	Comments/Remedial Action:	
	·······························	
		<del>~~~~</del>

	Date: $6-20-95$	
	Inspector: M. MATTLEWS Rainfall: 0	
	Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes: In compliance.  No: Increase leachate removal required.  Contact supervisor immediately.	
	Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes V/A: In compliance. No: Increase leachate removal required. Contact supervisor immediately.	
	Sump No. 4 Phase VI (Stormwater)  : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.	
Alban samen op enhøyere ken al Liste om en en til til en en	500,000 Gallon Tank at LTRF  : Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.	ing that gar est astigacións i de
e en trouge de la reception	Effluent Pond  : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.	e i viji kala kira kira i
	Observed runoff of effluent to stormwater basins? (Yes/No)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:	-
· :	Runoff Type       To Basin         Severe       A         Moderate       B         Minor       C         D	
	Comments/Remedial Action:	

	Date: 6-19-95
	Inspector: M. MAThews Rainfall: 1.4
e e e e e e e e e e e e e e e e e e e	Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes: In compliance.  No: Increase leachate removal required.  Contact supervisor immediately.
	Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes M: In compliance. No: Increase leachate removal required. Contact supervisor immediately.
teres to the	Sump No. 4 Phase VI (Stormwater)  Normal Operation  If level is less than level in Riser Phase IV, stop pumping to Basin D.
timo en 18 Lawrin Alfrida degree de se	500,000 Gallon Tank at LTRF  : Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.
and the second s	Effluent Pond  : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.
	Observed runoff of effluent to stormwater basins? (Yes No)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:
	Runoff Type         To Basin           Severe         A           Moderate         B           Minor         C           D
(	Comments/Remedial Action:
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	Inspector: M. MATTHEWS Rainfall: 0	·
	Inspector: ACATINEWS Rainfall:	
	Riser Phase IV Is Riser Phase IV below 27.6 inches (2.3 feet)?	
	Yes: In compliance.  No: Increase leachate removal required.	
	Contact supervisor immediately.  Piezometer Phase IV	1
	Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes WA: In compliance.	
	No: Increase leachate removal required.  Contact supervisor immediately.	
	Sump No. 4 Phase VI (Stormwater)  : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.	
ali ngan ding nangsik	500,000 Gallon Tank at LTRF  Normal Operation.	an Barra shakariyan
	If level is greater than 11 feet, increase treatment, hauling, or recirculation.  If level is less than 6 feet, decrease or stop hauling/ recirculation.	
e expligence de de el model	Effluent Pond: Normal Operation.	egi a se sala sa s T
	: If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.	
•	Observed runoff of effluent to stormwater basins? (Yes(No)	
	If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:	
	Runoff Type To Basin Severe A	
	Moderate B C D	
	Comments/Remedial Action:	
		<del></del>

	Date: 6-15-95	
	Inspector: M. MATThews Rainfall:	
	Riser Phase IV	
	Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes —: In compliance.	
	No: Increase leachate removal required.  Contact supervisor immediately.	
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	No: Increase leachate removal required.  Contact supervisor immediately.	
e store e e	Sump No. 4 Phase VI (Stormwater) : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.	
e Matria e de la compresión de	500,000 Gallon Tank at LTRF: Normal Operation.	t de modern tom en en en
	: If level is greater than 11 feet, increase treatment, hauling, or recirculation: If level is less than 6 feet, decrease or stop hauling/ recirculation.	
s in the part of earth and a factor.	Effluent Pond  Normal Operation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling	e same e tragge safig. Tr
	: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.	
	Observed runoff of effluent to stormwater basins? (Yes Not	
	If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:	-
	Runoff Type To Basin  Severe A  Moderate B  Minor C	
	Comments/Remedial Action:	

	Date:	6-14-95	·		
·	Inspector:	M. MATThews	Rainfall:	. ?	_
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	Riser Phase			•	
	) Y	s Riser Phase IV below 27.6 in es: In compliance.			
		lo: Increase leachate re Contact supervisor	emoval required. immediately		
	Piezometer				
	ls Y	s Piezometer Phase IV below : Yes W/A: In compliance.			
	. 1	lo: Increase leachate re Contact supervisor	emoval required. immediately.		
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	Sump No.	4 Phase VI (Stormwater)  : Normal Operation			
		: If level is less than level	in Riser Phase IV, stop pu	mping to Basin D.	
ili e ili e ili e coni e ile	500,000 G	allon Tank at LTRF: Normal Operation.	१४ - इस्पृत्रिक स्थापित अस्ति १८८ - १८८ - १८८ <del>सम्ब</del> र्णना स्टीस्स्टॉस	gan on an thank our and the profession constitution	e na <mark>este de co</mark> nstala en por
n e sa e sa e e e e e e e e e e e e e e e	_	: If level is greater than 1 : If level is less than 6 fee	1 feet, increase treatment	, hauling, or recirculation.	
Distribution page of the page of the page of	Effluent Po			g/ recirculation.	And the graph of the second
•	-	: Normal Operation.	ş.		
	_	: If level is 6 inches or les : If level is greater than 4	s, stop irrigation/ recircula feet, increase irrigation/ re	tion/hauling ecirculation/hauling.	
·	Observed r	unoff of effluent to stormwate			
		ntact supervisor immediately.		3	-
		op spray irrigation immediately		g information:	
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Date:	6-13-95				
nspector:	M. MATThers	) ç	Rainfall:	0.7	
Riser Phase	- IV				<del></del>
	Riser Phase IV below 2	77 6 inches 12 3	footla		
Y	es: In compliance	27.0 menes (2.5	ieetji		
N	o: Increase leach	Iate removal reo	uired		
	Contact super	visor immediate	julieu. Ny		•
D:		· · · · · · · · · · · · · · · · · · ·	• • • • • • • • • • • • • • • • • • • •	<del>**</del>	· · · · · · · · · · · · · · · · · · ·
Piezometer					
15	Piezometer Phase IV be	elow 27.6 inche	s (2.3 feet)?		
17	es <u>P/ra</u> : In compliance.				
14	o: Increase leach	ate removal req	uired.	•	
	Contact super	visor immediate	ly.		
	<u> </u>	<u> </u>		· .	
Sump No. 4	Phase VI (Stormwate	r er)			
	Normal Operation	•			
12 (1.4) 4 (1.5) <u>(m</u>	: If level is less than	level in Riser Pl	hase IV. stön n	umping to Bas	in D
Efffuent Por	: Normal Operation. : If level is 6 inches	6 feet, decreas  or less, stop irri	e or stop hauling	ng/ recirculation	n. egint beeks sene be
	: If level is greater th	nan 4 feet, incre	ase irrigation/ i	recirculation/ha	uling.
Observed ru	noff of effluent to storn	nwater basins?	(Yes (No)		
If Vac. Con	stant avantured in the				
Stor	tact supervisor immedia	ately.			i
510	p spray irrigation immed	iately and provi	de the followin	g information:	İ
	Runoff Type	To Basir		,	j
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	Moderate	—— A			
	Minor	B	•		i
		C			1
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imments/Re	medial Action:				
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Date:	6-12-95	<del></del>			
Inspector:	M. MAIThe	ا عد	Rainfall:	0.0	(Trace)
Yes	Riser Phase IV below 27 5: In compliance. : Increase leacha		red.		·
Yeş	iezometer Phase IV bel M/4: In compliance. ——: Increase leacha		red.		
	Phase VI (Stormwater Normal Operation : If level is less than I		se IV. stop p	umping to Basi	n D.
Effluent Pond	on Tank at LTRF  : Normal Operation.  : If level is greater th  : If level is less than (	an 11 feet, incre	ase treatment or stop haulin	t, hauling, or re ng/ recirculation	ecirculation. n.
	: If level is 6 inches o : If level is greater that	r less, stop irriga an 4 feet, increa	tion/ recircula se irrigation/ r	ation/hauling ecirculation/ha	uling.
If Yes: Conta	off of effluent to storm act supervisor immedia spray irrigation immedi	tely.		g information:	•
	Runoff Type Severe Moderate Minor	To Basin A B C D			•
omments/Ren ·	nedial Action:				
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Date: 6-9-95	
Inspector: M. MATTheres Rainfall: 0.0	
Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes: In compliance.  No: Increase leachate removal required.  Contact supervisor immediately.	
Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes V/1: In compliance. No: Increase leachate removal required. Contact supervisor immediately.	
Sump No. 4 Phase VI (Stormwater)  : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.	Steppen die
500,000 Gallon Tank at LTRF  Normal Operation.  If level is greater than 11 feet, increase treatment, hauling, or recirculation.  If level is less than 6 feet, decrease or stop hauling/ recirculation.	e de la companya de la companya de la companya de la companya de la companya de la companya de la companya de
Effluent Pond : Normal Operation: If level is 6 inches or less, stop irrigation/ recirculation/hauling: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.	କି ଲୋଗି ଓ ବ୍ୟବହାରଥିଲି ଯୁଗିଲ ପ
Observed runoff of effluent to stormwater basins? (Yes No.)  If Yes: Contact supervisor immediately, Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin	<b>-</b>
Severe A Moderate B Minor C D	
Comments/Remedial Action:	
	<del>-</del>

Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes : In compliance.  No :: Increase leachate removal required. Contact supervisor immediately.  Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches (2.3 feet)?  Yes //fr: In compliance.  No :: Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater)  Normal Operation :: If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF  Normal Operation. :: If level is greater than 11 feet, increase treatment, hauling, or recirculation. :: If level is greater than 11 feet, increase treatment, hauling, or recirculation. :: If level is Greater than 4 feet, increase trigation/ recirculation/hauling :: If level is greater than 4 feet, increase trigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes/GO)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D  Comments/Remedial Action:		Date:	6.8.95	_		
Is Riser Phase IV below 27.6 inches (2.3 feet)? Yes : In compliance. No :: Increase leachate removal required. Contact supervisor immediately.  Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes 2//E: In compliance. No :: Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater)		Inspector:	M. MATThews	_ Rainfall:	0.0	<u>.</u>
Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes ***/** In compliance. No increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater) Normal Operation if level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF Normal Operation if level is greater than 11 feet, increase treatment, hauling, or recirculation if level is greater than 11 feet, increase treatment, hauling, or recirculation if level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond : Normal Operation if level is 6 inches or less, stop irrigation/ recirculation/hauling if level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yestloo)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type		ls Y	s Riser Phase IV below 27.6 in es: In compliance.	moval required.		
Normal Operation  If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF  Normal Operation.  If level is greater than 11 feet, increase treatment, hauling, or recirculation.  If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond  Normal Operation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type  To Basin  Severe  A  Moderate  B  Minor  C  D		ls Y	Piezometer Phase IV below 2 es <u>N/A</u> : In compliance. o: Increase leachate rer	moval required.		
500,000 Gallon Tank at LTRF    Normal Operation.   If level is greater than 11 feet, increase treatment, hauling, or recirculation.     If level is less than 6 feet, decrease or stop hauling/ recirculation.		_	Normal Operation	in Riser Phase IV, stop	pumping to Basin D.	
Effluent Pond		April 18 miles (1965)	Normal Operation. : If level is greater than 11	feet, increase treatme	ent, hauling, or recirculation.	
Observed runoff of effluent to stormwater basins? (Yes)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type  To Basin  Severe  Moderate  Minor  C  D	Talips - ere menšnin	1	nd : Normal Operation. : If level is 6 inches or less	stop irrigation/ recirci	ulation/hauling	an andergr
If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type  To Basin  Severe  Moderate  Minor  C  D		Observed ru				
Severe A		If Yes: Cor Sto	ntact supervisor immediately. p spray irrigation immediately	and provide the follow		-
Comments/Remedial Action:			Severe Moderate	A B C		
	(	Comments/Re	emedial Action:			
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	Inspector: M. MATThews Rainfall: 0.0
	Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes: In compliance.  No: Increase leachate removal required.  Contact supervisor immediately.
	Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches (2.3 feet)?  Yes (4.4): In compliance.  No: Increase leachate removal required.  Contact supervisor immediately.
n an an an an an an an an an an an an an	Sump No. 4 Phase VI (Stormwater)  : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.
t de la Fille de la compania de la compania de la compania de la compania de la compania de la compania de la c La fille de la compania de la compania de la compania de la compania de la compania de la compania de la compa	500,000 Gallon Tank at LTRF  Normal Operation.  If level is greater than 11 feet, increase treatment, hauling, or recirculation.  If level is less than 6 feet, decrease or stop hauling/ recirculation.
m dina prompanji marazini.	Effluent Pond  : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.
	Observed runoff of effluent to stormwater basins? (Yes/No)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D
- -	Comments/Remedial Action:
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nspector:	M MATTLE	<u> </u>	lainfall:	0.0_	
Ye	Riser Phase IV below 27 s: In compliance. : Increase leacha		red.		
Ye:	Piezometer Phase IV bels NA: In compliance: Increase leacha		ed.		
	Phase VI (Stormwate : Normal Operation : If level is less than		se IV, stop p	umping to Basin I	).
Effluent Pond	lon Tank at LTRF : Normal Operation. : If level is greater th : If level is less than (  ! Normal Operation. : If level is 6 inches o : If level is greater that	an 11 feet, increa 6 feet, decrease o or less, stop irriga	ase treatmen or stop haulin tion/ recircul	t, hauling, or recing/ recirculation.	culation.
If Yes: Cont	act supervisor immedia spray irrigation immedia Runoff Type Severe Moderate Minor	tely. ately and provide To Basin A B C		g information:	
omments/Rer	medial Action:	D			

	Date:	6.5.95			
	Inspector:	M. MATTherus	Rainfall:	1.5	<del></del>
	J Y	e IV s Riser Phase IV below 27.6 es: In compliance. o: Increase leachate Contact supervisor	removal required.		
in the profit of the english	Piezometer Is Y	Charles Annual Control of the Contro	27.6 inches (2.3 feet)?		
•		Phase VI (Stormwater) : Normal Operation : If level is less than leve	el in Riser Phase IV, stor	pumping to Basin D.	
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e tale suure en pauva se uuri		Normal Operation.  : If level is 6 inches or le : If level is greater than 4	ss, stop irrigation/ recirc	culation/hauling	The state of the s
	If Yes: Con	noff of effluent to stormwa tact supervisor immediately o spray irrigation immediatel	ter basins? (Yes(No)	•	-
		Runoff Type Severe Moderate Minor	To Basin A B C D		
c -	Comments/Re	medial Action:			
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	Date: $6 \cdot 2 \cdot 95$	
	Inspector: M. MATThers Rainfall: 0.4	
	Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes : In compliance.  No : Increase leachate removal required.  Contact supervisor immediately.	
Messaria (1997) da	Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches (2.3 feet)?  Yes Mr. In compliance.	er u skrepe, by
	No: Increase leachate removal required.  Contact supervisor immediately.	
•	Sump No. 4 Phase VI (Stormwater)  Normal Operation  If level is less than level in Riser Phase IV, stop pumping to Basin D.	
garangan dan salah dan dan dan dan dan dan dan dan dan dan	500,000 Gallon Tank at LTRF  Normal Operation:  If level is greater than 11 feet, increase treatment, hauling, or recirculation.  If level is less than 6 feet, decrease or stop hauling/ recirculation.	
A section of sections and sections and sections and sections of sections and sections are sections as the section of sections and sections are sections as the section of sections are sections as the section	Effluent Pond  Normal Operation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.	
	Observed runoff of effluent to stormwater basins? (Yes No)	
	If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:	-
	Runoff Type         To Basin           Severe         A           Moderate         B           Minor         C           D	
	Comments/Remedial Action:	
-		

Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes : In compliance.  No : Increase leachate removal required. Contact supervisor immediately.  Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches (2.3 feet)?  Yes : In compliance.  No : Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater) : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Jank at LTRF : Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is greater than 6 feet, decrease or stop hauling/ recirculation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Disserved runoff of effluent to stormwater basins? (Yes leve)  If yes: Contact supervisor immediately and provide the following information:  Runoff Type	Date:	6-1-55	<del></del>			
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Contact supervisor immediately.  Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches (2.3 feet)?  Yes PA: In compliance.  No: Increase leachate removal required.  Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater) : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF : Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.  iffluent Pond : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Disserved runoff of effluent to stormwater basins? (Yes No)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type			e removal re	auired.		
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Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater)  Normal Operation  If level is less than level in Riser Phase IV, stop pumping to Basin D.  O00,000 Gallon Tank at LTRF  Normal Operation.  If level is greater than 11 feet, increase treatment, hauling, or recirculation.  If level is less than 6 feet, decrease or stop hauling/ recirculation.  If level is less than 6 feet, decrease or stop hauling/ recirculation.  If level is 6 inches or less, stop irrigation/ recirculation/hauling  If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type  To Basin  Severe  Moderate  Minor  C  D			e removal re	guired.		
Sump No. 4 Phase VI (Stormwater)						-
Normal Operation  : If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF  : Normal Operation.  : If level is greater than 11 feet, increase treatment, hauling, or recirculation.  : If level is less than 6 feet, decrease or stop hauling/ recirculation.  : If level is less than 6 feet, decrease or stop hauling/ recirculation.  : If level is 6 inches or less, stop irrigation/ recirculation/hauling  : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes No)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type				•		
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Soo,000 Gallon Tank at LTRF		: Normal Operation				
Soo,000 Gallon Tank at LTRF		: If level is less than le	vel in Riser F	hase IV, stop	pumping to Ba	sin D.
Normal Operation.   If level is greater than 11 feet, increase treatment, hauling, or recirculation.   If level is less than 6 feet, decrease or stop hauling/ recirculation.	500,000 G					<u>,</u>
: If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.  : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes No)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	eri Jawas I wa	Normal Operation	Agrico Basic Language	Le les de la companyación	لها الصافرية أولوز بارد العلول	es, a gager que époné éla conject e
: If level is less than 6 feet, decrease or stop hauling/ recirculation.  : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	<del>-</del>					
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If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type  Severe  Moderate  Minor  C  D		: If level is 6 inches or : If level is greater than	n 4 feet, incr	ease irrigation/	lation/hauling recirculation/l	nauling.
Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D		to storme	vater basinsi	Trestivor		· •.
Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	If Yes: Cor	ntact supervisor immediate	elv.			•
Runoff Type To Basin Severe A Moderate B Minor C D				ride the followi	ng information	1:
Severe A Moderate B Minor C D		4.	•			•
Moderate B C D		Runoff Type	To Basi	'n		
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			B	•		
		Minor	C			
mments/Remedial Action:		<u> </u>	D	ı		
mments/Remedial Action:			····			
	mments/Re	emedial Action:		<del></del> .		
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DATE: 6-1-95	TIME:	0800
Leachate Treated (gallons)	and the second of the second o	44668
Treated Effluent Stored (gallons)		3768
Treated Effluent Sprayed (gallons)		40 900
Pump Capacity 300 gal/min x minutes run = gal sprayed	<b>%</b> =	х
Comments:		
Operator Signature: William & Ho	mblown	8015B

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Date: 6-2-95

Time: 0800

Leachate Treated (gallons)	45 436
Treated Effluent Stored (gallons)	4556
Treated Effluent Sprayed (gallons)	40,900

Comments:					•
•			 		 
	1				
			 	·	
		<del></del>	 		

Operator Signature: William S. Homblower 8015B

Leachate Treated	d (gallons)		44841
Treated Effluent	Stored (gallons)		4484/
Treated Effluent	Sprayed (gallons)		-0
Cump Capacity 300 Ninutes run =		<b>%</b> =	x
comments:	•		
	**************************************		·
marator Signatur	e: William S. Ho	11- 0	0158

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Leachate Treated (ga	llons)	· · · · · · · · · · · · · · · · · · ·	44 898
Treated Effluent Stor	red (gallons)	·	44 898
Treated Effluent Spra	ayed (gallons)		-0
Pump Capacity 300 gal/minutes run =	min x gal sprayed	% =	x
Comments:		<u> </u>	
Operator Signature:	William 8	Horallow.	801 CB

DATE: 6-5.-95

Leachate Treated (gallons)

Treated Effluent Stored (gallons)

Treated Effluent Sprayed (gallons)

Pump Capacity 300 gal/min x

minutes run = gal sprayed

Comments: RA.N

Operator Signature: William J. Honellown 8015B

Leachate Treated (gallons)	<del></del>	43 058
Treated Effluent Stored (gallons)		4158
Treated Effluent Sprayed (gallons)		40 900
<pre>ump Capacity 300 gal/min x inutes run = gal sprayed omments:</pre>	<u> </u>	x
omments:		
		80158

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Operator Signature: William S. Hornblower 8015B

DATE: 6-8-95	TIME:_	0800
Leachate Treated (gallons)		44 895
Treated Effluent Stored (ga	llons)	3995
Treated Effluent Sprayed (ga	allons)	40,900
minutes run = gal Comments:		
•		

DATE: 6-9-95	TIME:	0800
Leachate Treated (gallons)		44837
Treated Effluent Stored (gallons)		3937
Treated Effluent Sprayed (gallons)		40,900
Pump Capacity 300 gal/min x minutes run = gal sprayed	% = <u> </u>	x
Comments:		
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DATE: 6-10-95			TIME:_		0800	<del></del> -
Leachate Treated (gallo	ons)				34 9	72
Treated Effluent Stored	d (gallo	ns)			349	72
Treated Effluent Spraye	ed (gall	ons)			0	
	n x gal sp	rayed	· =		_ x	·
Comments: Hunber	10	Gi	est, m	<u>- (</u>	electr.	cah j
Operator Signature:	(128	. D /	1 11			

e videns en la grande de la gra

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4.5

DATE: 6 - 1/1 - 95	TIME:	0800
Leachate Treated (gallons)	<u>, mini,</u>	41,569
Treated Effluent Stored (gallons)		41.569
Treated Effluent Sprayed (gallons)		D
<pre>Pump Capacity 300 gal/min x minutes run = gal sprayed Comments:</pre>	% =	x
Operator Signature: William &	. Hornblows	n 8015B

angle dans a di angle la maganjama da tana da la na na magamang da la magani ad ang magani da magani da na na na magamana ang magamang magang magang magaman da na

 $((x,y)^{2})^{2}(x,y$ 

	Leachate Treated (gallons)	13828	] ?
	Treated Effluent Stored (gallons)	0	1
	Treated Effluent Sprayed (gallons)	40,900	1
• *	Pump Capacity 300 gal/min x	/ectrical	
•	Operator Signature: William S. Homblower 801		- -

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ter interest in the second in the second in the second in the second in the second in the second in the second In the second in the second in the second in the second in the second in the second in the second in the second In the second in

	DATE: 6-13-75	TIME:	0800
	Leachate Treated (gallo	ons)	45 284
	Treated Effluent Stored	d (gallons)	45284
	Treated Effluent Spraye	ed (gallons)	0
me e e e		n x	x
	Comments: RAIN Eff	ect 48 hour u	lait.
•			
			***************************************
•	Operator Signature:	William S. Homblor	un 8015B
e engag sak gara engal s	i in terperatura (t. 1220) des reconstruitados, como tentre a enfortar e	e 1995, as estados para en estados ligidos do los estados en	er sassa sa tangan ng mga sa sakarang sa san

t the training of the training of the common the comment of the co

DATE: 6-14-95

Leachate Treated (gallons)

Treated Effluent Stored (gallons)

Treated Effluent Sprayed (gallons)

Pump Capacity 300 gal/min x 8 = x minutes run = gal sprayed

Comments: Arin effect 48 hour wait.

	DATE: 6-13-75	TIME:	0800
	Leachate Treated (gallons)		45430
	Treated Effluent Stored (gallons)		4530
	Treated Effluent Sprayed (gallons)		40,900
etan ige	<pre>Pump Capacity 300 gal/min x minutes run = gal sprayed Comments:</pre>	_% =	<b>x</b>
			·
	Operator Signature: (1). Ohio l	Un blan	VAICA

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granin na makanaga ay ili an a sann ga asa antii iyansa aa ahgay sa a s S

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agal partitus pergerak. Bi pelah galamitan di kanjawaran pera termilikan dibangan angan angan belah salah

andreas from the state of the state of program and the state of the st

Leachate Treated (gallons)		45660
Treated Effluent Stored (gallons)		4760
Treated Effluent Sprayed (gallon:	5)	40 900
<pre>Pump Capacity 300 gal/min x minutes run = gal spray Comments:</pre>	% =	х

SAT

DATE: 6-17-95	TIME:	0800
Leachate Treated (gallons)		45-140
Treated Effluent Stored (gallons)		45140
Treated Effluent Sprayed (gallons)		-0-
<pre>Pump Capacity 300 gal/min x minutes run = gal sprayed Comments:</pre>	% =	x
Commencs.		
	1 1	
Operator Signature: William S. A	Tomblow	n 8015B

SUN

Leachate Treated (gallons)		14685
Treated Effluent Stored (gallons)		14685
Treated Effluent Sprayed (gallons)		0
Pump Capacity 300 gal/min x minutes run = gal sprayed	_% =	<b>x</b>
·		
Comments: NO Spra	4	· · · · · · · · · · · · · · · · · · ·

<b>&gt;</b> ,	DATE: 6-19-95	TIME:	0800
	Leachate Treated (gallons)		45770
	Treated Effluent Stored (gallons)		45770
	Treated Effluent Sprayed (gallons)		0
· 李林枫 医囊节节	Pump Capacity 300 gal/min x minutes run = gal sprayed	% =	x
	Comments: LAIN NO SPRAY		
	· ·		
. •	Operator Signature: William &	Hornblow	es 8015B

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DATE: 6 -20- 95	TIME:	0800
Leachate Treated (gallons)		45200
Treated Effluent Stored (gallons)		3/80
Treated Effluent Sprayed (gallons)		42020
Pump Capacity 300 gal/min x minutes run = gal sprayed	<u> </u>	x
Comments:		·
		·
Operator Signature: (1)	11	P. SOUTH

delitare i deservicio de contra contra contra de la compansión de la compansión de la compansión de la compansión de securidad de la compansión de securidad de la compansión de la compa

DATE: 6-21-95	TIME:	0800	_
Leachate Treated (gallons)		45220	
Treated Effluent Stored (gallons)		620	
Treated Effluent Sprayed (gallons)		44600	
<pre>Pump Capacity 300 gal/min x minutes run = gal sprayed Comments:</pre>	<b>%</b> =	x	· .
	:		_
			_
Operator Signature: William		lower 8015B	- - · ·
Special of biginature. With a second of the	and the second second second second second	and the second s	

	DATE: 4-22-95	TIME:	0800
	Leachate Treated (gallons)		44980
	Treated Effluent Stored (gallons)		44980
	Treated Effluent Sprayed (gallons)		0
	Pump Capacity 300 gal/min x minutes run = gal sprayed	<u></u> 8 =	x
	Comments: CAIN HOSPERT	<u></u>	
•	Operator Signature: (1)	11 00	2 Par B

 $\mathcal{E}(\chi_{\mathcal{A}}) \simeq \{(x_1,x_2,\dots,x_N) : \chi_{\mathcal{A}}^{(n)} \neq (\chi_{\mathcal{A}}^{(n)},x_1,\chi_{\mathcal{A}}^{(n)},\chi_{\mathcal{A}}^{(n)},\chi_{\mathcal{A}}^{(n)}\}\}$ 

an este a contrata que esta en en la para cara cara comercia de esta comerció () el deporte actorio de 1850 de forma esta en en esta en entre en entre en entre en entre en entre en entre en entre en

Park Services

	DATE: <u>6-23-95</u>	TIME:	7,000
	Leachate Treated (gallons)		45470
	Treated Effluent Stored (gallons)		45470
	Treated Effluent Sprayed (gallons)		-0-
, kasem en n.S.	Pump Capacity 300 gal/min x minutes run = gal sprayed  Comments: RAN	<b>%</b> =	X
٠	condition est y-14 t to		
	•		
•	Operator Signature: William S. Horn	blower 8	015B

And the second of the second

DATE: 6 - 29 - 75	TIME:	0800
Leachate Treated (gallons)		45 230
Treated Effluent Stored (gallons)		45230
Treated Effluent Sprayed (gallons)		-0
Pump Capacity 300 gal/min x minutes run = gal sprayed	<b>8</b> =	x
Comments:		<u> </u>
Operator Signature: William S. He	omblower	8015B

and the second of the contract of the contract of the second

Charles & Land Control of the

DATE: 6-25-95	TIME:	0800
Leachate Treated (gallons)		45060
Treated Effluent Stored (gallons)		45060
Treated Effluent Sprayed (gallons)		0
<pre>Pump Capacity 300 gal/min x minutes run = gal sprayed Comments:</pre>	% = <u> </u>	x
Comments.		
		· · · · · · · · · · · · · · · · · · ·
Operator Signature: William & 4	on flower	SOUCE

Kanadan salah Majarat jajawa sa Kajarat

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DATE: 6 - 26 - 95	TIME:	0800	
Leachate Treated (gallons)		44955	
Treated Effluent Stored (gallons)	<u> </u>	44985	
Treated Effluent Sprayed (gallons)		6	
Pump Capacity 300 gal/min x minutes run = gal sprayed	& =	x	
Comments: Ai,4			٠.

**3** 

A Company

DATE: 6 -27-95	TIME:	0800
Leachate Treated (gallons)		45455
Treated Effluent Stored (gallons)		45455
Treated Effluent Sprayed (gallons)		0
Pump Capacity 300 gal/min x gal sprayed  Comments: RAIN	<b>%</b> =	x
Operator Signature: William S. Ho	zy flower	8015B

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3**9** 134 3

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Leachate Treated (gallons)	(	14 985
Treated Effluent Stored (gallons	)	785
Treated Effluent Sprayed (gallor	s)	14,200
Pump Capacity 300 gal/min x minutes run = gal spra	yed	х

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DATE: 675	TIME:_	0800
Leachate Treated (gallons)		45 175
Treated Effluent Stored (gallons)		1175
Treated Effluent Sprayed (gallons)	-	44,000
Pump Capacity 300 gal/min x minutes run = gal sprayed	% = <u> </u>	x
Comments:		
Operator Signature: William &	Harlow	es 8N/CR

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DATE: 6 - 3/2 / 3 TIME:	0800
Leachate Treated (gallons)	44450
Treated Effluent Stored (gallons)	18850
Treated Effluent Sprayed (gallons)	25600
Pump Capacity 300 gal/min x	x
Comments: RAIN Began @ 11.00	
Operator Signature: 4/10 / 1/2 //2	PAICA

	FAX CO	VER	5157865-7-1-6-100-7-1-100-7-1-100-7-1-100-1	
Environmental Consultants  3012 U.S. Highway 301 North  Suite 700  Tampa, Florida 33619  FROM:  JOB/DVERHEAD NUMBER:  NUMBER OF PAGES:  COMMENTS:  As requested, Please attached find the leachate  report forms for May, June and partial July 1995.  The forms were adjusted to include calculated in the July form was adjusted to include reads from the July form was adjusted to include reads from the piezometer and the new contours of the Jow area in Phase IV.	TO:	NAME: COMPANY NAME: FAX NUMBER:	FOEP 744-61	125
Suite 700 Tampa, Florida 33619  FROM:  Larry E. Rvi Z  JOB/OVERHEAD NUMBER:  NUMBER OF PAGES:  GOMMENTS:  As requested, please attached find the leachate  report forms for May, June and partial July 1995.  The forms were adjusted to include related includes for missing data of leachate treated.  The July form was adjusted to include reads  from the fierometer and the new contours of the low area, in Phase IV.	• • • •		SCS	ENGINEERS
DOB/OVERHEAD NUMBER: D990018.35  NUMBER OF PAGES:  4  COMMENTS:  As requested, Please attached find the leachate report forms for May, June and partial July 1995.  The forms were adjusted to include calculated values for missing data of leachate treated. The July form was adjusted to include ready from the piesemeter and the new contours of the low area in Phase IV.	Environmental Consulta	Suite 700		Pfione 813 621-008( FAX 813 623-675)
to requested, please attached find the leachate report forms for May, June and partial July 1995.  The forms were adjusted to include calculated values for missing data of leachate treated. The July form was adjusted to include reading from the pierometer and the new contours of the low area. in Phase IV.	•	RHEAD NUMBER:		
The forms were adjusted to include calculated values for missing data of leachate treated. The July form was adjusted to include reading from the pierometer and the new contours of the low area in Phase IV.		please a Hache	d find the	leachate_
the low area in Phase IV.	The forms	were adjusted -	to include of	alculated be treated.
Please call if you have my guestions.	from the power	rea in Phase	IV.	Contours of
Thanks Ferry Rin	Please Call	if you have	tha y vest	Jeen Ri

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#### LEACHATE WATER BALANCE REPORT FORM **MAY 1995**

							SOUTHEA	IST COUNTY		LLSBORGUGI	H COUNTY, F	il.	2411	VIII	VOI	XV	XVI
		ш		III	IV	V	Al	VII	VIII	IX	X	XI	XII	XIII	XIV	Total	AVI
		_"	Т			Est. Depth	Est.	Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Efficent	Landfill
		Area	- 1		Effluent	Over	Landfill	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir-	- CONTROL - 10 PM	1000
1 1		The second second	- 1	Rainfall	Pond	Liner	Storage	to LTRF	Tank	at LTRF	Hauled	culation	Storage	Sprayed	culation	Hauled	Evapor. (gal.)
		(acres)	int.	(in.)	(in.)	(in.)	(gal.)	(gal.)	(gat.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(_lsg)	39,000
Day		5.0	92.2	0.0	22.0	15.DI	1,115,000	193,000	317,000	52,104	68,680	0	68,000	48,600	O-	24,800	39,000
- 1	23.2	5.0	92.2	0.0	18.0	15.D	1,115,000	45,000	259,000	40,190	82,017	0	55,000	48,600	0	12,400	
2	23.2	5.0	92.2	0.0	23.0	15.0	1,115,000	82,000	259,000	44,243	37,362	0	71,000	48,600	0	24,800	39,000
3	23.2	5.0	92.2	0.0	24.0	15.0	1,115,000	69,000	230,000	35,584	62,487	0	75,000	48,660	0	18,661	
4	23.2	5.0	92.2	0.6	29.0	16.0	1.189.000	74,000	202,000	46,207	56,157	0	92,000	48,610	0	24,800	39,000
5	23.2	5.0	92.2	0.0	18.0	16.0	1,189,000	53,000	173,000	44,174	37,262	0	55,000	0	0	18,448	0
6	23.2		92.2	0.0		15.0	1,115,000	40,000	173,000	39,940	0		NR	0	0	0	0
7	23.2	5.0	92.2	0.0		15.0	1,115,000	115,000	173,000	46,530	68,268	0	113,000	48,600	0	24,800	39,000
8	23.2		92.2	0.0		15.0	1,115,000	88,000	173,000	44,537	43,470	0	102,000	39,600	0	18,600	32,000
9	23.2	5.0		0.0			1,609,000	41,000	144,000	44,578	24,957	0	92,000	39,600	0	24,853	32,000
10	23.2	5.0	92.2	0.0			1,264,000	29,000	115,000	44,982	12,400	0	92,000	39,600	0	30,944	32,000
11	23.2	5.0	92.2	0.0				93,000	144,000	45,385	18,413	0	61,000	39,600	0	31,060	32,000
12	23.2	5.0	92.2	0.0		16.0		78,000	173,000	48,750	0		NR	0	0	0	0
13	23.2	5.0	92.2	0.0					NR	42,840	0	0	NR	0	0	0	0
14	23.2	5.0	92.2				8414	190,000	230,000	45,961	43,608	0	102,000	48,600	0	24.787	39,000
15	23.2	5.0	92.2	0.0		16.0	1,189,000	65,000	202,000	44,213	49,862	0	88,000	48,600	0	18.714	39,000
16		5.0	92.2	0.0			1,115,000	60,000	173,000	45,480	43,443	0	81,000	48,600	0	24,847	39,000
17		5.0	92.2	0.0			1,189,000	64,000	173,000	45,470	18,888	0	68,000	37,600	0	30,966	30,000
18		5.0					1,189,000	87,000	202,000	45,625	12,561	0	45,000	37,600	0	37,417	30,000
19		5.0	92.2	0.0		4.00	Contract of the last of the la	46,000	202,000	45,780	0	0	49,000	0	0		C
20		5.0					NR	VB	NR	45,030	0	C	61,000	0	0	0	C
21		5.0						192,000	259,000	45,470	43,483	C	124,000	37,600	0	24,655	30,000
22		5.0						36,000	230,000	45,910	18,891	C	106,000	48,600	0		39,000
23		5.0						77,000	230,000	45,532	31,197	C	92,000	48,600	0	24,862	39,000
24		5.0	92.2					76,000	230,000	45,154	31,137	0	81,000	48,600	0	37,968	39,000
25		5.0	92.2					58,000	230,000	45,154	12,400	0	55,000	48,600	0	62.614	39,000
26		5.0						74,000	259,000	44,884	0		30,000	0	0	0	0
27		5.0						NR PA	NR	44,614	0	0	NR	0	0		0
28		5.0			NR	NR	NR 1.115,000	125,000	238,000	45,132	6.340	. 0	81,000	0	0		0
29								82,000	238,000	45,131	37,314		75,000	48,600	0	31,041	39,000
3.0				-				70,000	258,000	45,030			58,000	48,600	0	24,845	39,000
3	23.2	5.0	92.2	0.0	19.0	16.0	1,189,000	70,000	250,000	75,750	1 20,112	-					
								2 202 000	6,019,000	1,389,714	865.725	0	2,072,000	1,000,270	0	652,689	803,000
Total				2.40						45.000		-		45,000	0	27,000	37,000
Daily Av	g			0.08	24.5	15.8	1,175,000	74,000	154,000	45,000	1 30,000			-	mav.lea	Revised by	LER, 7/18/

- 1. NR = No Records.
- 2. Column il. tota area with waste is 120 4 acres (Phases -IV)
- 3 Columns II and IV, field measured.
- 4 Column V. estimated from depth in Phase IV riser.
- 5 Column VI estimated from Column V and approximate volume with top of clay exevation at 118.5 feet.
- 6. Column VII, balculated from Column IX Column X Change in Storage of 500-000 gall tank
- 7. Column Vill calculated from depth in 500,000 gal. eachate tank
- 8 Columns IX and XIII quantities from flow meters.
- 9 Columns X, XI, XIV and XV quantities calculated from truck weight
- 10 Column XV 80.8% of the daily values from Columns X , XIII and XIV.
- 11. Values in shaded cells substitute for missing data and are pascillon averaged values

#### LEACHATE WATER BALANCE REPORT FORM JUNE 1995

							SOUTHEA	ST COUNTY	LANDFILL, HI	LSBOROUG	H COUNTY, F	L		VIII	VIV	XV	XVI
					IV	V	VI	VII	VIII	IX	Χ	AL	XII	XIII	XIV	Total I	- Avi
		11		Ill		Est. Depth	Est.	Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Effluent	Landfill
				1	Effluent	Over	Landfill	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir	Hauled	Evapor.
		Area		n 1.1.n		Liner	Storage	to LTRF	Tank	at LTRF	Hauled	culation	Storage	Sprayed	culation	(gal.)	(gai.)
		acres		Rainfall	Pond (in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	25,000	33,000
			int.	(in.)	18.0		1,189,000	117,000	317,000	44,668	43,924	0	55,000	40,900	0	25,000	33,000
	23.2	5.0	92.2	0.0	16.0	16.0	1,189,000	54,000	288,000	45,436	37,361	0	49.000	40,900	0	25,300	33,000
2	23.2	5.0	92.2	0.8	12.0		1,189,000	70,000	288,000	44,841	24,858	0	36.000	0	0	25.000	0
3	23.2	5.0	92.2	0.0			NR	NR	NR	44,898	0		NR	0	0	37,000	0
4	23.2	5.0	92.2	1.5	23.0	1411	1,189,000	214,000	374,000	45,283	37,400	0	71,000	0	0	37,000	33,000
5	23.2	5.0	92.2	0.0		-	1,189,000	29,000	345,000	45,058	12,449	0	58,000	40,900	0	25,000	33,000
6	23.2	5.0	92.2				1,115,000	77,000	345,000	45,365	31,402	0	52,000	40,900	0	31,000	33,000
7	23.2	5.0	92.2	0.0	-		1,189,000	63,000	345,000	44,895	18,594	0	58,000	40,900	- 0		33,000
8	23.2	5.0	92.2				1,189,000	64,000	345,000	44,837	18,664	0	45,000	40,900	0	37,000	33,000
9	23.2	5.0	92.2		N		1,189,000	56,000	345,000	43,203	12,500			C	0	12,000	0
10	23.2	5.0	92.2	0.0					NR	41,569	0		NR	C	0		33,000
11	23.2	5.0	92.2		411	11.22	1.115,000	203,000	432,000	43,427	31,237	0	61,000	40,900	0	31,000	33,000
12	23.2	5.0	92.2			-	1,189,000	105,000	461,000	45,284	31,267	0	45,000	0	0	19,000	0
13	23.2	5.0	92.2					73,000	432,000	45,335	56,130		55,000	0	0	19,000	33,000
14	23.2	5.0	92.2				1,189,000	79,000	403,000	45,430	62,140			40,900	0	12,000	33,000
15	23.2	5.0	92.2				1,189,000	42,000	374,000	45,660	24,880			40,900	0	43,000	33,000
16	23.2	5.0	92.2		Annual Contract of the Contrac			70,000	374,000	45,140	24,937			0	0	19.000	- 6
17	23.2	5.0	92.2				NR	NR	MR	45,455	0	0	NR	0	0	0	0
18	23.2	5.0	92/2		NR	121.5			403,000	45,770	56,329	0		0	0	37.000	
19	23.2	5.0	92 2					107,000	403,000	45,200	62,042	. 0		42,020	0	31.000	34,000
20	23.2	5.0	92.2					66,000	374,000	45,220	49,872	0		44,600	0	6.000	36,000
21	23.2	5.0	92.2					57,000	374,000	44,980	12,492	. 0		0		25,000	C
22		5.0	92/2				1,189,000	71,000	374,000	45,470	25,053	G	61,000	0		38,000	0
23		5.0		NR	20.0			58,000	374,000	45,230				0			0
24		5.0						NR DO, COS	NR	45,060		0	NR	0			0
25	23 2	5.0	92.		NR .	NR	NR 1.139,000		432.000	44,955		0		0			0
26		5.0								45,455		0	71,000	0			0
27	23.2	5.0								44,985			61,000	44,200			36,000
28	23.2	5.0								45,175			61,000	44,000			36,000
29	23.2	5.0								44,450			55,000	25,600	0	5C,000	21.000
30		5.0	92.	2 0.	0 18.	0 17.0	1,264,000	34,000	343,000	1.,,,,,,,							
									-		1						
							00 703 000	2.311,000	9.727.000	1,347,734	904.543	3 0	1,387,000	568,520		758,000	460,000
Total				8.3						45,000				41,000		29,000	33,000
Daily Avg				0.3	11 17.	5 15.9	1,183,000	77,000	324,000	40,000	00,000				iuma fas I	Revisec by LER	7/17/95

#### Notes.

- 1 NR = No Records
- 2. Column I total area with waste is 120.4 acres iPhases I- Vi.
- 3 Columns II and W. field measured
- 4. Column V estimated from depth in Phase iV riser.
- 5. Column V, estimated from Column V and approximate volume with top of clay elevation at 118.5 feet.
- 8. Column VIII calculated from Column IX + Column X + Change it 510 age of 500 000 gall tank
- 7. Column VIII, carculated from depth in 500 000 gal. leachate tank
- 8. Columns IX and XIII, quantities from flow meters
- 9. Columns X, XI, XIV, and XV, quantities calculated from truck weight
- 10 Column XVI, 80 8% of the daily values from Columns XI, XIII and XIV
- 11. Values in shaded cells substitute for missing data and are based on averaged values.

### LEACHATE WATER BALANCE REPORT FORM

**JULY 1995** 

							SOUTHEA	ST COUNTY	LANDFILL, HI	<b>LLSBOROUGH</b>	1 COUNTY, F	L		Send	χIV	ΧV	XVI
						V	V.	VII	MII	IX	Α	AI.	XII	XIII	Effluent	Total	
1		11		[1]			Est.	Leachate	eachate	Leachate	Tetal	Leachate	Effluent		Recir-	Effluent	Landfill
						Est. Depth	Landfill	Pumpad	in 500K	Treated	Leachate	Recir-	Pond	Effluent	culation	Hauled	Evapor.
i i		Area			Effluent	Over	Storage	to LTRF	Tenk	at LTRF	Hauled	culation	Storage	Sprayed	(gai.)	(gaL)	(gal.)
1		BC186		Rainfall	Pond	Liner   (is.)	(cal.)	(gal.)	(gal.)	(gal.)	(çeL)	(gal.)	(gal.)	(gal.)	(Bair)		- 1327
Day	final a	ctive	int.	lin.l	[in.]			74.000	374,000	44,985	- 0	0	42,000	0	- 0	31,000	<del></del>
1	23.7	5.0	92.2	0.0	14.0				NR	45,415	0	0		44,200	- 0	37,000	36,000
2	23.2	5.0	92.2	0.0	***	16.0	1,189,000	163,000	403,000	44,890	43,549	0	81,000	44,200		37,500	00,000
3	23.2	5.0	92.2	0.1	20.0				NR	44,965	0	0	65,000		0	37,000	34,000
4	23.2	5.0	92.2	0.0	21.0	16.0	1.189,000	128,000	403,000	45,585	37,632	0	61,000	42,250 42,250	Ö		34,000
5	23.2	5.0	92.2	0.0	20.0	16.0	1,189,000	117,000	432,000	44,865	43,431	0	61,000		- 6		34,000
6	23_2	5.0	92.2	0.0	20.0		1,264,000	50.000	374,000	45,590	62,287	0	55,000	42,250	- 0		34,000
7	23.2	5.0	92.2	0.0	18.0			51,000	374,000	45,070	6,200	0	49.000	0	- 0		<del></del>
8	23.2	5.0	92.2		16.0				NR	45,070	0		NR	0			34,000
9	23.2	5.0	92.2		NR	141.		169,000	403,000	45,085	50,274	0	102,000	42,250	- 8		34,000
10	23.2	5.0	92.2		32.0			79,000	374,000	45,160	62,308	0	85,000	42,250			30,000
11	23.2	5.0	92.2		27.0			50,000	317,000	45,103	62,132	0	75,000	36,900	0		30,000
12	23.2	5.0	92.2					41,000	288,000	45,045	25,041	0	65,000	0	0		
13	23.2	5.0	92.2					70,000	288,000	45.315	24,900	0	61,000	C			- 0
14	23.2	5.0	92.2					35,000	259,000	45,360	18,756		75,000	0	0		22.000
15	<del></del>	5.0	92.2					74,000	288,000	45,000	0		71,000	27,400	0		22,000
16	23.2	5.0	92.2					NR		MR	0		NR		NR	0	
		NR	NR		FNFN	VR	NR	NR	NR	NR	O	NR	NR		NR	0	0
		NR	NR _		NR	NR	NR	NR	NR	NA	0	NR	NR		NR	0	0
		NR	NR		NR	NR	NR	NR	NR	NR.	<u>0</u>	NR	NR		NR	0	0
		NR	NR		NR	NR	NR	NR	NR	NR	0	NR	NR		NR	0	C
		NR	NR	0.0	NR	NR	NR		INR	NR	0	NR	NB		NR	0	C
		NR	NR		NR	NR	NR	NR	NR	NR		NR	NR		NR	0	0
			NR		NR	NR	NR	NR NR	NR	NR	0	NR	NR		NR	0	0
	NR NR	NR	NR		NR	NR	NR	NR NR	NR NR	NR	0	NR	NR		NR	0	0
	NR	NR	NR		NR	NR	NR	NR NR	NR .	NR	1 0	NR _	NB		NR	0	0
	6 NR	NR	NR		NR	NR	NR	NR.	NR	NB	1 0	NR	NR	I	NR	0	0
	7 NR		NR	0.0	NR	NR	NR	NR NR	NR	NR	1	NR	NR		NR	0	0
	BINR	NR	NR	0.0	NR	NR	NR		NR -	INR		NR	NR		NR	0	
	9 NR	NB	NR	0.1	O NR	NR	NR	VR	NR.	NR	1	NR	NR		NR	0	
	ONR	NR	NR	0.0	O NR	NR	NR	NR .	NR	NR	1 6	NR.	NR	0	NR	0	0
	1 NA		INR	0.0	O NR	NR	NR	NR	- PAIR	1.212	<del> </del>	1					<u> </u>
<u> </u>	+	<del>                                     </del>	+			:	1	1	4.577.000	722,483	436.510	2 0	928,000	319,750	0		258,000
Total	+	<del>                                     </del>		2.6	0 300.									40,000			32,000
Daily Av	<del></del> -	+	+	0.1	6 21.	4 38.	8 5,756,000	69,000	302,000	73,000	1,		<del></del>		sel.ylaj	Revised by LER	, 7,18/95.

#### Notes.

- 1 NR = No Federds
- 2. Column P, total area with waste is 320.4 acres (Phases I-IV).
- 3 Columns I and IV field measured
- 4. Column V estimated from depth in: Before 7 10 95 Phase IV riser and after 7 10 95 Phase IV Piezometer.
- 5. Coumnity estimated from Column V and approximate volume with topicf clav elevation at: Before 7 10 95 118.5 feet and after 7 10 95 117.0 feet
- 6. Column VII. calculated from Column IX. + Column X. + Change in Storage of 500,000 gal. tank.
- 7 Column VIII, calculated from depth in 500,000 gal, leachate tank.
- 8 Columns IX and XIII quantities from flow meters
- 3. Columns X, XI, XIV, and XV, quantities calculated from truck weight.
- 10. Column XVI. 80.8% of the daily values from Columns XI. Xv. and XIV
- 11. Values in shaded cells substitute, for missing data and are based on averaged values

FAX CO	VER		
TO:	DATE: NAME: COMPANY NAME: FAX NUMBER:	7/18 Hr. Kim FOEP 744-61	195 Ford, P.E.
	PHONE NUMBER:		<u>00 (382)</u> ENGINEERS
Environmental Consulta	3012 U.S. H Suite 700 Tampa, Flori	liphway 301 North da 33619	Phone 813 621-008 FAX 813 523-675
•	FROM: ERHEAD NUMBER: JMBER OF PAGES:	larry E. 0990018	Rvi 2
1995. The forms values for the July for from the	please attachens for May were adjusted missing data rm was adjusted it someter an ara in Phase if you have	to include a of leacha is ted to in d the new	alculated to treated. clude reador contours of
	<i>y Q</i> .	Tha	Jany Piz

# DRAFT

## LEACHATE WATER BALANCE REPORT FORM MAY 1995

Day if		1		III	١٧	٧	VI	VII	VIII	LLSBOROUGI IX	X	<b>X</b> 1	XI	XIII	XIV	xv	XVI
Day if																	
Day if		_		- 1	Depth in	Est. Depth	Est.	Leachate	Leschete	Leachate	ota	Leachate	Effluent		Efflüent	Total	
Day ifi					Effluent	Over	Landfill	Pumped	in: 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir-	Effluent	Lendfill
Day ifi		Area		Rainfall	Pond	Liner	Storage	to LTRC	Tank	at LTRF	Hauled	culation	Storage	Sprayed	culation	Hauled	Evapor.
Day in	final la	resi	int.	(in.)	(in.)	(in.)	(gaL)	(gal.)	(gal.)	(gal.)	<u>lgal.)</u>	(gal.)	(ga.)	(gal.)	(gel)	(gal.)	(gal.)
			92.2	0.01	22.0	15.01	1,115,000	193,000	317,000	62,104	68,680	O	68,000	48,600	0	24,800	39,000
	23.2	5.0	92.2	0.0	18.0	15.0	1,115,000	45,000	259,000	40,190	62,017	C,	55,000	48,600	0	12,400	39,000
	23.2	5.0	92.2	0.0	23.0	15.0	1,115,000	82,000	259,000	44,243	37,362	C	71,000	48,600	0	24,800	39,000
	23.2	5.0	92.2	0.0	24.0	15.0	1,115,000	69,000	230,000	35,584	62,487	C	75,000	48,660	0	18,661	39,000
	23.2	5.0	92.2	0.6	29.0		1,189,000	74,000	202,000	46,207	56,157	0	92,000	48,610	0	24,800	39,000
	23.2	5.0	92.2	0.0			1,189,000	53,000	173,000	44,174	37.262	0	55,000	0	0	18,448	
	23.2	5.0	92.2	0.0		15.0	1,116,000	40.000	173,000	39,940	0	0	NR	0	0	0	
	23.2		92.2	0.0	35.0		1.115,000	115,000	173,000	46,530	68,268	0	113,000	48,600	0	24,800	39,000
	23.2	5.0	92.2	0.0	32.0		1,115,000	88,000	173,000	44,537	43,470	0	102,000	39,600	0	18,600	32,000
	23.2	5.0		0.0	29.0	20.0	1,609,000	41,000	144,000	44,578	24,957		92,000	39,600	0(	24,853	32,000
	23.2	5.0	92.2	0.0	29.0		1,264,000		115,000		12,400	0_	92,000	39,600	0	30,944	32,000
	23.2	5.0	92.2	0.0			1,284,000	93,000	144,000	45,385	18,413	0	61,000	39,600	0	31,060	32,000
	23.2	5.0	92.2	0.0		16.0	1,189,000	78,CO0	173,000	48,750	C	0	NR	0	0	0	0
	23.2	5.0	92.2	0.0		NR IGG		NR	NB	42,840	0	0	NIR	3	0	0	0
	23.2	5.0	92.2				1411	190,000	230,000	45,961	43,808	0	102,000	48,600	0	24,787	39,000
	23.2	5.0	92.2	0.0				65,000	202,000	44,213	49,862	0	88,000	48,600	0	18,714	39,000
	23.2	5.0	92.2					60,000	173,000	45,480	43,443	0	81,000	48,600	0	24,847	39,000
	23.2	5.0	92.2	0.0				64,000	173,000	45,470	18,888	0	68,000	37,600	0	30,966	30,000
	23.2	5.0_	92.2						202,000		12,561	0	45,000	37,600	0	37,417	30,000
	23 2	5.0	92.2	0.0				46,000	202,000	45,780	0	0	49,000	0	0	0	0
	23 2	5.0	92.2	0.9				NR	NR	45,030	0	0	61,000	0	0	0	0
	23.2	5.0	92.2	0.2					259,000		43,483	0	124,000	37,600	O	24,655	30,000
	23.2	5.0	92.2	0.0				38,000	230,000	45,910	18,891	0	106,000	48,600	0	18.623	39,000
	23.2	5.0	92.2	0.0				30,000	230,000		31,197	0	92,000	48,600	☐ of	24,862	39,000
	23.2	5.0	92.2	0.0				76,000	230,000	45,154	31,137	0	81,000	48,500	0	37,968	39,000
	23.2	5.0	92.2	0.0				58,000	230,000	45,154	12,400	0	55,000	48,600	0	62,614	39,000
	23.2	5.0	92.2	0.0				30,000	259,000		0		30,000	0	0	0	0
	23.2	5.0	92.2	0.0			NR	NB	NR	44,514	ō		NR	0	0	0	0
	23.2	5.0	92.2		NA	NR		125,800		45,232	6,340			0	O	37,184	0
	23.2	5.0	92.2					128,800	288,000		37,314			48,6CO	0	31,041	39.000
	23.2	5.0	92.2	0.0				70,000		45.030	25,128			48,6CO	0	24,845	39,000
31	23.2	5.0	92.2	0.0	19.0	16.0	1,189,000	70,000	200,000	45,000	1 202.20	<del>                                     </del>	1				
					1	<b>_</b>	1 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2 2	2 202 622	6.019.000	1,389,714	865,725	0	2.072.000	1,000,270	0	652,689	803,000
Total				2.40				2,302,000	194,000	45,000	36,000			45,000	ō	27,000	37,000
Daily Avg				0.08	24.5	5 15.8	1,175,000	74,000	134,000	40,900	1 30,000	<u> </u>			may lea	Revised by	y LER, 7/18/

#### Notes:

- 1. NR = No Records
- 2. Court in total gree with waste is 120.4 acres (Phases 9.4).
- 3 Columns III and fv. field measured
- 4. Column V, estimated from depth in Phase IV isser.
- 5. Column VI estimated from Column V and approximate volume with too of play elevation at 118.5 feet
- 6. Column VIII calculated from Column IX + Column X + Change in Storage of 500 000 gall tank
- 7 Column VIII, calculated from depth in 500,000 gall leachate tank
- 8. Columns IX and XIII, quantities from flow meters.
- 9. Columns X, XI, XIV and XV quantities calculated from truck weight.
- 10. Column XVI  $\,$  80.8% of the daily values from Columns XI. XIII and X  $\,$  V
- 11. Values in shaded cells substitute for missing data and are based on averaged values

# DRAFT

XIII

ΧI

XII

45,000

55,000

61,000

42,000

78,000

71,000

61,000

61,000

55,000

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1,387,000

44,600

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june lea Revised by LER, 7.17/95.

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XIV

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XVI

36,00C

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36,000

36,000

21,000

460,000

33,000

#### LEACHATE WATER BALANCE REPORT FORM JUNE 1995 SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

VIO

VII

107.000

66,000

57,000

71,000

58,000

185,000

60,000

108,000

73,000

34.000

NR

414.0 30.787.000 2,311,000 9,727,000

W

1,189,000

1,189,000

1,189,000

1,189,000

1.189.000

1,189,000

1,189,000

1.189,000

1,189,000

1,264,000

15.9 1,183,000

16.0

16.0

16.0

16.0

16.0

16.0

16.0

160

16.0

17.0

NR

ŧΧ

45,220

44,980

45,470

45,230

45,060

44.955

45,455

44,985

45, 175

44,450

45,CO0

1,347,734

49,872

12,492

25,053

12,328

37,434

43,795

62,658

56,157

18,640

904,543

35,000

0

1		В		μs	IA		·						1	Effluent		Effluent	Total	
<del></del>	<del></del>				Depth is	ı Est.	Depth	Est.	Leachate	Leachate	Leachate	Total	eachate		P40		Effluent	Landfill
	1	Area	1		Eiffluen	1 -	ver	Landfill	Pumpec	in 500K	Treated	Leechete	Recir-	Pond	Sffluent	Recir		B
ď	l			Caindal	.1	· 1	inver	Storage	to LTRF	Tank	at LTRF	Hauled	culation	Storage	Sprayed	culation	Hauled	Evapor.
		(acres)		Raintal		-	in.)	(dar)	(gal.)	(gal.)	(gal l	(921.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)
Day	tinal	active		(in.)	(in.)			1.189,000	117,000	317.000	44,668	43,924	01	55,000	40,900	0	25,000	33,000
1	23.2	5.0	92.2	0.0		_	18.0		54,000	288,000	45,436	37,361	0	49,000	40,900	0	25,000	33,000
2	23.2	5.0	92.2	0.4			16.0	1,189,000	70,000	288,000	44,841	24,858	0	36,000	0	0	25,000	0
3	23.2	5.0	92.2	9.0			16.0	1,189,000		NR	44,898	0		NR	C	0	O	0
4	23.2	5.0	92.2		NR	NR		4 40 4		374,000	45,283	37,400	ō	71,000	G	e O	37,000	0
	23.2	5.0	92 <u>.2</u>	1.5			16.0	1,189,000	214,000	345,000	45,058	12,449	0	58,000	40,90C	<b>480</b>	37,000	33,000
-	23.2	5.0	92.2	0.0			16.0	1,189,000	29,000		45,365	31,402	0	52,000	40,900	0	25,000	33.000
<del></del>	23.2	5.0	92.2	0.0			15.0	1,115,000	77,000	345,000		18,594	0	58,000	40,900	ō	31,000	33,000
1	23.2	5.0	92.2	0.0	19	.0	16.0		63,000	345,000	44,895	18,664	<del>  5</del>	45,000	40,900		37,000	33,000
1 9	23.2	5.0	92.2	0.1	15	.0	16.0		64,000	345,000	44,837		l ŏ	30,000	0	- 0	12,000	D
10		5.0	92.2	0.0	10	.0	16.0		1000	345,000				NR SECON	<u>_</u>	0	0	- 0
1	23.2	5.0	92.2	NR	NR	NR		NR	MR	NR	41,559	0			40,300	o	31,000	33,000
	_	5.0			0 20	.0	15.0	1,115,000	0.5		<u> </u>	31,237				0	19,000	00,000
1			92.2		7 15	.0	18.0	1,189,000	105,000	461,000	45,234	31,267		45,000	0			<u>~</u>
1	+		92.2			.0	16.0	1,189,000	73,000	432,000	45,33 <u>5</u>	56,130		55,000	0	0	19.000	22.400
							16.0	1,189,000	79,000	403,000	45,430	62,140			40,900	0	12.000	33,000
1						_	16.0	1,189,000	42,000	374,000	45.660	24,880			40,900	D	43 000	33,000
1							15.0		70,000	374,000	45,140	24,937	0		0	0		- 4
1					NR IS	NR		NR	NR	NR		0	0	NR	0	0		0
1						.0	16.3		176,000	403,000	45,770	56,329	0	58,000	0	0	0	0
L1	9 23.2	5.0				<del></del>	16.3		107 030	403.000	45,200	62,042	0	42,000	42,020	0	31,000	34,00C

374,000

374,000

374,000

374,000

432,000

403,000

403,000

374,000

345,000

NR

77,000 324,000

#### Notes:

Daily Avg

1. NR = No Pecords.

20 23.2

21 23.2

22 23.2

26 23.2

27 23.2

28 23.2

23

24

25 23.2

29 23.2

30 23.2

23.2

23.2

- 2. Column III total area with waste is 120 4 acres (Phases HV)
- 3. Columns lit and 'V', field measured
- 4. Column V. astimated from depth in Phase IV riser

92.2

92.2

92.2

92.2

92.2

92.2

92.2

92.2

92.2

92.2

92.2 NR

5.0

5.0

5.0

5.0

5.Q

5.0

5.01

5.0

6.0

5.0

5.0

0.0

0.0

0.4

0.0

0.9

0.0

0.0

0.0

0.0

8.30

0.31

1.3 NR

14.0

15.0

18.0

20.0

14.0

25.0

23.0

20.0

20.0

18.0

455.0

17.5

INR.

- 5. Column VI estimated from Column V and approximate volume with top of clay elevation at 118.5 feet.
- 6. Column III i calculated from Column IX + Column X + Change in Storage of 500 000 gail rank
- 7. Column VIII, calculated from depth in 500 000 gall leachate tank
- 8. Calumns, X and XIII, quantities from flow meters.
- 9. Columns XIIX. XIV. and XV, quantities calculated from truck weight
- 10 Column XVI, 80 8% of the daily values from Columns XI, X and XIV
- 11. Values in shaded cells substitute for missing data and are based on averaged values.

# DRAFT

#### LEACHATE WATER BALANCE REPORT FORM JULY 1995

SOUTHEAST COUNTY LANDFILL, HILLSBORGUGH COUNTY, FL																	
_		41		111	IV	v	VI	VII	VIII	ΙX	X	XI	XII	XIII	XIV	XA	XVI
		<u> </u>		<del>- "-</del> 1		Est. Depth	Est.	Leachate	Leachate	Leachate	Total	Leachate	Effluent		Effluent	Total	
1 1		Area			Effluent	Cyer	Landfill	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir	Effluent	Landfill
l i			ì	Rainfal	ond 2	Liner	Storage	to LTRF	Tank	at LTRF	Hauled	culation	Storage	Sprayed	culation	Hauted	Evapor.
1		(active	int.	(in.)	tin.)	(in.)	(gal.)	(gai.)	(gal.)	(gal.)	(gsi.)	(gal.)	(gal.)	(gal.)	(gal.)	(g &l.)	(gal.)
Day		5.01	92.2	0.0	14.0	16.0		74,000	374,000	44,985	0			0	0		9
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#### july lea Revised by LER, 7/18/95.

#### Notes

- 1. NR = No Records
- 2 Column total area with waste is 120 4 acres (Phases V)
- 3. Coumns littand Vilfied measured
- 4. Column Villest mated from depth in Before 7 10 95 Phase IV riser and after 7 10 95 Phase IV Plezometer.
- 5. Column VI estimates from Column V and approximate volume with top of clay elevation at: Before 7 10 95 118.5 feet and after 7 10 95 117.0 feet
- 6. Column VIII calculated from Column IX Column X + Change in Storage of 500 000 gall tank
- 7. Column VIII. calculated from depth in 500,000 gal. leachate tank
- 8. Columns, X and XIIII, quantities from flow meters
- 9 -Columns X, X, XIV, and XV, quantities calculated from truck weight
- 10. Column XVI, 80.8% of the daily values from Columns XII, XIII and XIV.
- 11. Values in shaced calls substitute for missing data and are based on averaged values



#### Florida

Office of the County Administrator
Daniel A. Kleman

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Senior Assistant County Administrator Patricia Bean

Assistant County Administrators
Edwin Hunzeker
Cretta Johnson
Jimmie Keel
Robert Taylor



July 14, 1995

Mr. Kim Ford, P.E.
Solid Waste Permitting
Florida Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

D.E.P.

JUL 17 1995

TAMPA

RE: Southeast County Landfill - Leachate Management System

Dear Mr. Ford:

In accordance with the Florida Department of Environmental Protection (DEP) Permit No. SO29-158504 for the County's Southeast County Landfill (Landfill), the Department of Solid Waste (DSW) is formally notifying the DEP of a temporary condition which exists at the Landfill which limits the DSW's ability to achieve the leachate levels required by the DEP for a portion of the Landfill.

Specifically, the recently installed piezometer in Phase IV of the Landfill has revealed that a low point exists in Phase IV. Although this is a temporary condition, it is preventing some leachate from being conveyed to the collection point of the Landfill. Attachment 1 provides the lithologic descriptions from the drilling of the piezometer. The first drilling location, Alt-1, was abandoned due to uncertainties in the top of clay elevation, and Alt-2 was developed as the piezometer location.

Attachment 2 is a letter from the DSW's landfill consultant, SCS Engineers (SCS), which provides additional information concerning the temporary low point. SCS has calculated that approximately 16.3 acres of the Landfill have a leachate level above the 24 inch depth, resulting in approximately 9.5 million gallons of leachate that must be removed by alternate means.

In accordance with Permit No. SO29-158504 General Condition No. 6, the DSW is obligated to operate and maintain all facility systems, including the requirement to operate backup or auxiliary systems when necessary to achieve compliance with the permit conditions. In accordance with that requirement, on July 13, 1995, the DSW installed a temporary suction pump in TPS3 with a suction line that will reach the leachate within the area of the low point in Phase IV. The DSW intends to monitor the leachate level in the piezometer to determine the pumping lowers the level in the piezometer. The DSW intends to install a permanent suction pump in TPS3 if a downward trend is observed.

Mr. Kim Ford July 14, 1995 Page Two

Should the leachate level fail to respond to the permanent suction pump, the DSW is committed to installing a new temporary pump station in the low area of Phase IV in order to maximize the efficiency of the leachate collection system.

SCS has estimated that the DSW should begin to observe an influence in the piezometer from the temporary suction pump within several days. Based on this information, the DSW will proceed with the permanent suction pump installation. The DSW will inform the DEP of its intended action prior to installing any permanent modifications to the leachate collection system.

Should you have any questions concerning the information provided or if you would like to meet and discuss the matter further, please call me at 276-2908. The DSW would also welcome you to visit the Landfill and observe the temporary suction pump installation if you desire.

Sincerely,

Patricia V. Berry

Landfill Services Section Manager

Department of Solid Waste

Attachments

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

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		ATTAC	HMENT 1			
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## LITHOLOGY DESCRIPTION PIEZOMETER LOCATION ALT-1

Well No: **Piezometer** ALT-1 Date Drilled: July 5, 1995 Project: Southeast Landfill David Teslicko -Driller: Location: Phase IV SELF Recorded by: David Adams Sample Type: None Total Depth: 23.25' Not Applicable Casing: Depth: Diameter: Interval: Screen: Not Applicable Diameter: Material: Not Applicable Notes: DEPTH BELOW

LSD (FEET) LITHOLOGY DESCRIPTION

0-1' Grass & Roots, fine sand, light grey, slightly silty

1-3' Fine sand, light to dark grey, slightly silty, dark grey to black ash near bottom

3-19' Dark grey to black ash mixed with waste such as wood, metal, plastic, and tire chips

19-19.5' Dark grey to black ash material mixed with waste material and traces of sand

19.5-20' Grading dark to light grey sand, slightly silty, with no waste materials

#### **BEGIN SPLIT SPOON SAMPLING**

20 - 20.5' Grey sand, poorly sorted, good spoon sample
20.5 - 21' Grey sand, poorly sorted, good spoon sample
21 - 21.5' Grey sand, poorly sorted, good spoon sample
21.5 - 22.5' Grey sand, Spoon dropped 1 ft. with three hammer blows, very little sample in spoon
22.5 - 23.25' Grey sand, very little sample in spoon, clay was evident on outside of the spoon.

The hole was cleaned out to a total depth of 23.25 feet, and the augers were tripped out for inspection. Clay was evident on the bottom 6 to 8 inches of the auger flight. A discussion among the on site engineer Larry Ruiz of SCS Engineers, the County's hydrologist David Adams, and the driller David Teslicko of Law Engineering, concluded that the top of clay layer was not clearly defined, and it had been penetrated, therefore the decision was made to move on to the alternate location ALT-2

## LITHOLOGY DESCRIPTION PIEZOMETER LOCATION ALT-2

Well No: Piezometer ALT-2 Date Drilled: July 5, 1995 Southeast Landfill Project: Driller: David Teslicko -Phase IV SELF Location: Recorded by: David Adams Sample Type: None Total Depth: 22.51 Casing: Depth: 22.51 4-inch Diameter: 20.5 - 22.51 Screen: Interval: 4-inch Diameter: PVC Sch-80 Material: Notes:

DEPTH BELOW

LSD (FEET) LITHOLOGY DESCRIPTION

Grass & Roots, fine sand, light grey, slightly silty
Fine sand, light to dark grey, slightly silty, dark grey to black ash near bottom
Dark grey to black ash mixed with waste such as wood, metal, plastic, and tire chips
Dark grey to black ash material mixed with waste material and traces of sand
BEGIN SPLIT SPOON SAMPLING
Grey sand, poorly sorted. good spoon sample
Grey sand, poorly sorted, good spoon sample
Grey sand, poorly sorted, good spoon sample
Grey sand, poorly sorted, good spoon sample
Grey sand, poorly sorted, good spoon sample
Grey sand to light grey sand (approx. 1.5 inches in bottom of spoon shoe)

The top of clay was clearly defined at 22.5 feet below land surface (bls). The borehole was then cleaned out to approximately 22.5 feet bls, and the piezometer was set at this depth. The auger flights were then tripped out and inspected, and a trace of clay was evident on the very bottom. This observation further supported the top of clay being defined at 22.5 feet bls.

	ATTAC	HMENT 2		
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Environmental Consultants

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#### SCS ENGINEERS

July 14, 1995 File No. 0990018.35

Patricia V. Berry Hillsborough County Department of Solid Waste P. O. Box 1110 Tampa. Florida 33601

Subject:

Southeast County Landfill Piezometer Data Review

Dear Patty:

On July 5, 1995, a piezometer was installed in Phase IV to monitor the leachate depth over the liner in the Southeast County Landfill (SELF). The piezometer was constructed as shown on Figure 1. On July 6, 1995, the piezometer was surveyed by the county's land surveyor and on July 7,1995, the piezometer was developed by personnel from the Hillsborough County Department of Solid Waste (HCDSW). The piezometer was monitored on July 7 and July 10, 1995, indicating leachate depths of 53 inches and 58 inches, respectively.

Figure 2 shows the approximate top of clay contours presented in the pending permit application. Figure 2 was compiled from settlement calculations and field exploration data obtained in December 1993 and February 1994. The available data suggested that the low point in the landfill was in the area of Pump Station No. 3 (TPS3). Data from the recent installation of the piezometer indicates that the low point of the landfill apparently is just to the south of TPS3 as shown in Figure 3. We believe this is a temporary condition and that the final low point will still occur in Phase VI as originally projected by Ardaman and Associates, Inc.

The current condition is preventing some leachate from being conveyed to TPS3. In order to bring the leachate depth within the low point to the depth required by the Florida Department of Environmental Protection (FDEP), SCS recommends that the HCDSW proceed with a phased action plan as follows:

Install a temporary suction pump in TPS3 with a suction line that will reach the
leachate within the low area. The leachate collection pipe discharging into TPS3
from Phase IV intersects the existing low area. After the suction pump is activated,
the leachate depth in the piezometer should be monitored daily. If a downward
trend in the leachate depth is observed, then a permanent suction pump should be
installed in TPS3. SCS understands that this action was already implemented by
the HCDSW on July 13, 1995.



Patricia V. Berry July 14, 1995 Page 2

• If the suction pump does not reduce the leachate depth, then a new temporary pump station should be installed within the low area in Phase IV.

Based on the new estimated top of clay contours of the low area as shown in Figure 3 and the recent piezometer readings, SCS estimates that approximately 9.5 million gallons of leachate must be removed to lower the leachate depth in the piezometer to 24 inches (Figure 4). As stated in correspondence dated December 16, 1995, from the HCDSW to the FDEP and previous hauling quantities, the SELF leachate collection system can provide for the removal of 150,000 gallons per day (gpd) until recharging through the drainage layer becomes the controlling factor. We estimate that at a removal rate of 150,000 gallons per day, approximately 3 to 4 months of pumping will be required to meet the 24-inch leachate depth objectives (Figure 5).

Please do not hesitate to call if you have any questions.

Very truly yours,

Larry E. Ruiz

Senior Project Engineer

Robert B. Gardner, P.E.

Vice President

SCS ENGINEERS

LERARBGIKM

**Attachments** 

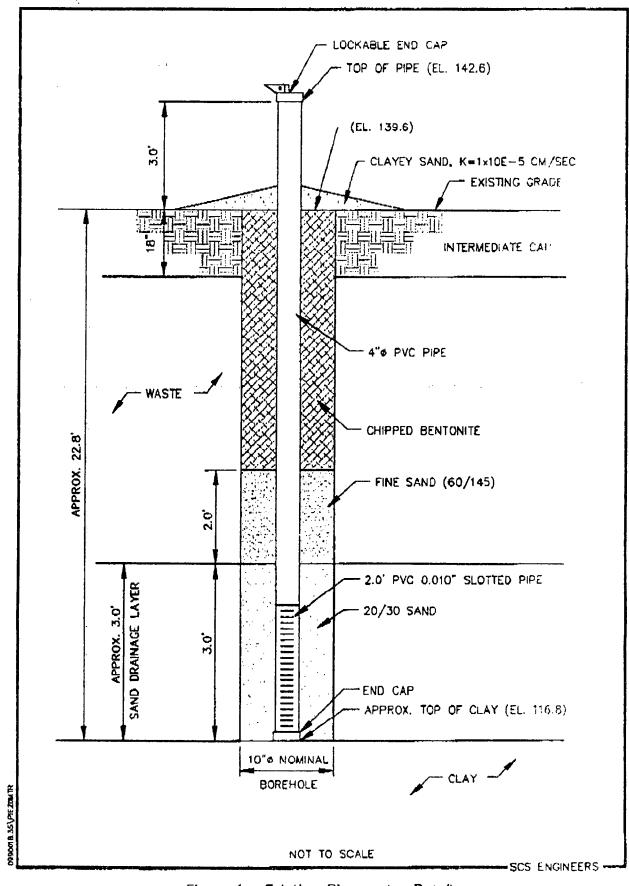


Figure 1. Existing Piezometer Detail.

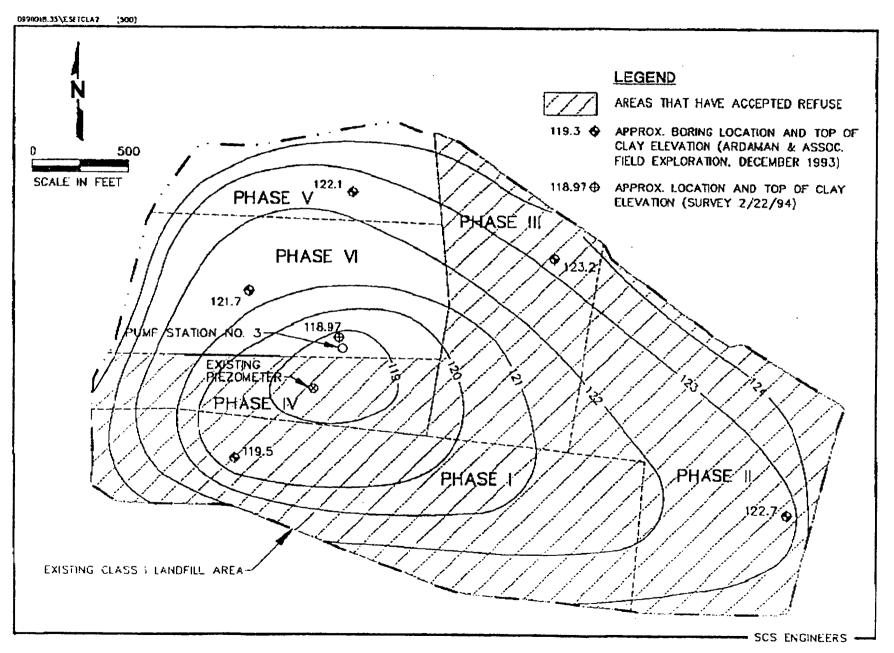


Figure 2. Approximate Top of Clay Elevation.

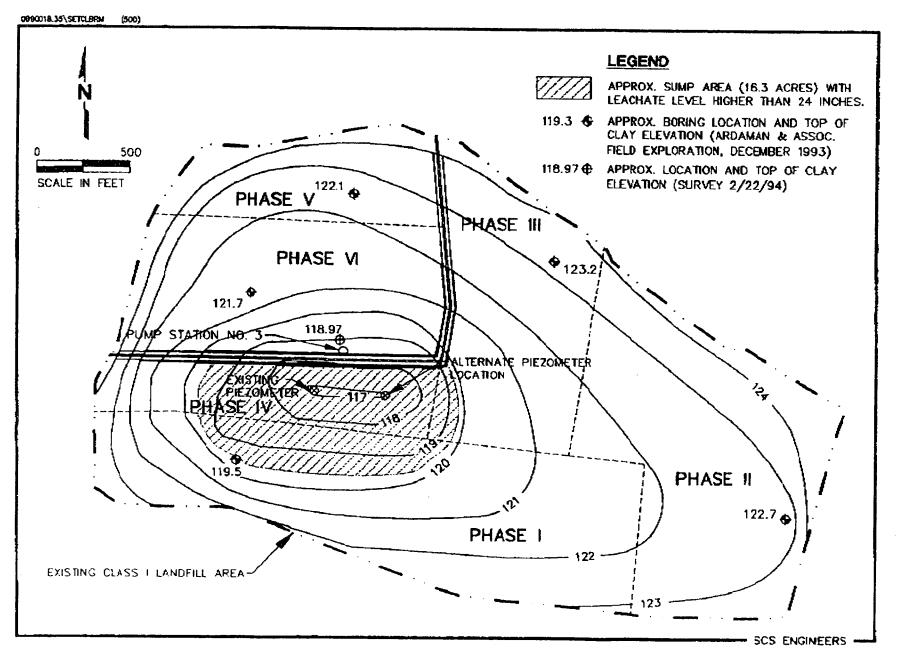


Figure 3. Existing Limit of Sump Area.

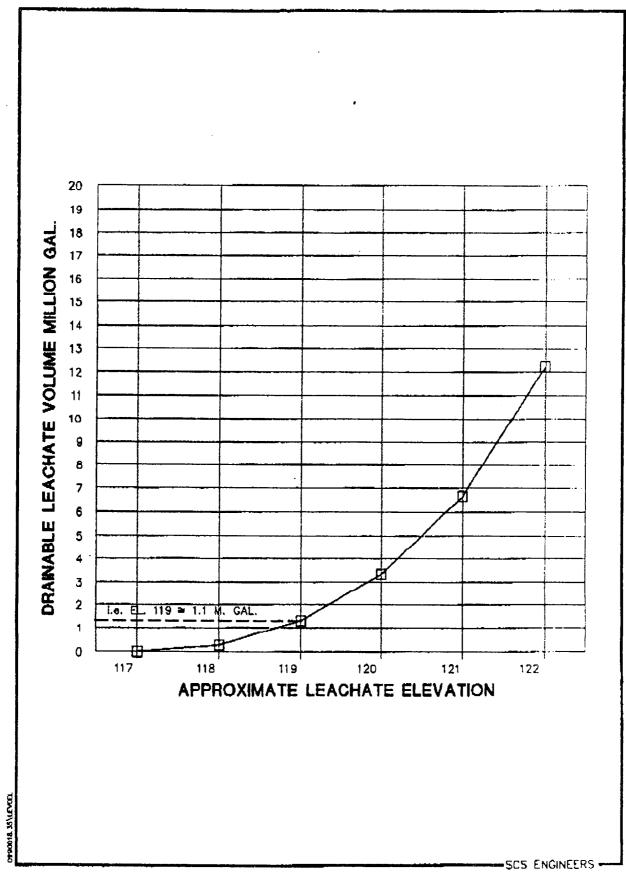
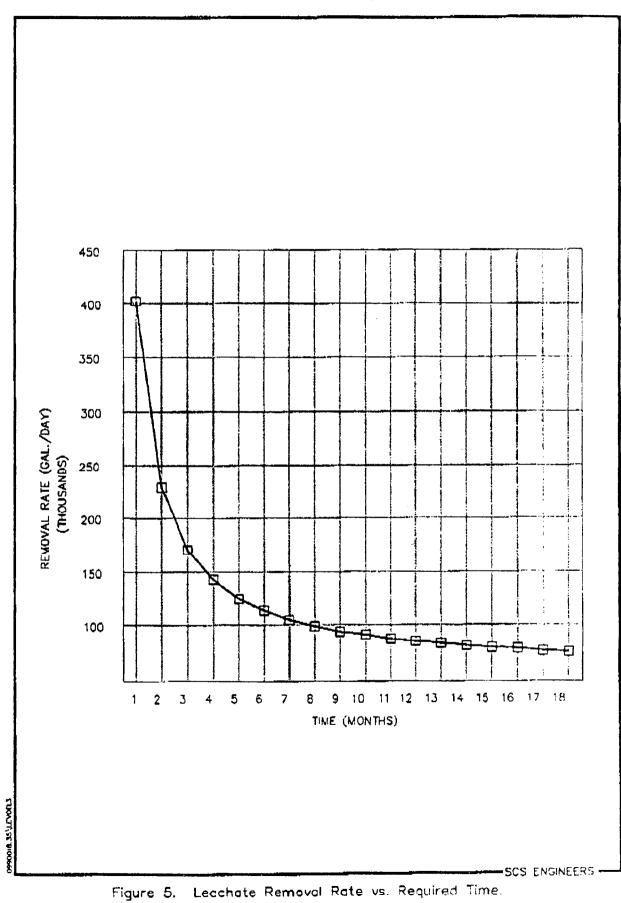


Figure 4. Leachate Volume Vs. Elevation, Southeast Landfill, Hillsborough County.



# STATE OF FLORIDA DEPARTMENT OF ENVIRONMENTAL REGULATION SOUTHWEST DISTRICT

## CONVERSATION RECORD

Date 7/14/95 Subject SE LF
Time Permit No County HWs Co
MR (ARRY Rose Telephone No. 6210880
Representing 3C5
[ ] Phoned Me [ Was Called [ ] Scheduled Meeting [ ] Unscheduled Meeting
Other Individuals Involved in Conversation/Meeting
Summary of Conversation/Meeting
Reades 100
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PHASE IL ITU St READ MONTHLY UNTIK
SETTLEMENT PLATES ALL INSTALLED.
2. A SPRIMAD SHIEF BE PROSIDED FOR ALL
3. LEACHAGE SPREADSHEET HOR JUNE -> July 14 BE
3. LEALITATE SPILEAD SAFETY PURCHASING
provides by Tursday about 7/18/95
LARRY SAND 'OK I WHI BE INSPECTION WEW
Section pump trady
(continue on another Signature
sheet, if necessary)  Title

PA-01 1/93 hjs



## Hillsborough County

Department of Solid Waste \* P.O. Box 1110 Tampa, FL 33601

Sender's Telephone Number: 276-2908

24-Hour PAX Line - (813) 276-2960



DATE: 6-14-95
TO: Kim Mad Together We CAN-DO It"

TO: Kim Mad Together We CAN-DO It"

TO: Kim Mad Together We CAN-DO It"

TO: Kim Mad Together We CAN-DO It"

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Household Chemical Collection - Adopt-A-Road & Adopt-A-Shore
Environmental Enforcement - Yard & Wood Waste Processing - Landfill Services
Community Collection Centers - Environmental Testing

## HILLSBOROUGH COUNTY

#### Florida

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Porticia Beau

Assistant Councy Administrators
Edwin Hunzeker
Cretts Julinson
Jimmic Keel
Robert Taylor

July 14, 1995

Mr. Kim Ford, P.E.
Solid Waste Permitting
Florida Department of Environmental Protection
3804 Coconut Palm Drive
Tampa, Florida 33619

RE: Southeast County Landfill - Leachate Management System

Dear Mr. Ford:

In accordance with the Florida Department of Environmental Protection (DEP) Permit No. SO29-158504 for the County's Southeast County Landfill (Landfill), the Department of Solid Waste (DSW) is formally notifying the DEP of a temporary condition which exists at the Landfill which limits the DSW's ability to achieve the leachate levels required by the DEP for a portion of the Landfill.

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In accordance with Permit No. SO29-158504 General Condition No. 6, the DSW is obligated to operate and maintain all facility systems, including the requirement to operate backup or auxiliary systems when necessary to achieve compliance with the permit conditions. In accordance with that requirement, on July 13, 1995, the DSW installed a temporary suction pump in TPS3 with a suction line that will reach the leachate within the area of the low point in Phase IV. The DSW intends to monitor the leachate level in the piezometer to determine the pumping lowers the level in the piezometer. The DSW intends to install a permanent suction pump in TPS3 if a downward trend is observed.

Post Office Box 1110 · Tampa, Florida 33601 An Affirmatio ActualEqual Opportunity Employer Mr. Kim Ford July 14, 1995 Page Two

Should the leachate level fail to respond to the permanent suction pump, the DSW is committed to installing a new temporary pump station in the low area of Phase IV in order to maximize the efficiency of the leachate collection system.

SCS has estimated that the DSW should begin to observe an influence in the piezometer from the temporary suction pump within several days. Based on this information, the DSW will proceed with the permanent suction pump installation. The DSW will inform the DEP of its intended action prior to installing any permanent modifications to the leachate collection system.

Should you have any questions concerning the information provided or if you would like to meet and discuss the matter further, please call me at 276-2908. The DSW would also welcome you to visit the Landfill and observe the temporary suction pump installation if you desire.

Sincerely,

Patricia V. Berry

Landfill Services Section Manager

Vatrien O Beny

Department of Solid Waste

**Attachments** 

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

## **ATTACHMENT 1**

#### LITHOLOGY DESCRIPTION PIEZOMETER LOCATION ALT-1

July 5, 1995 Date Drilled: ALT-1 Piezoneter Well No: David Teslicko - Law Driller: Southeast Landfill Project: Recorded by: David Adams Phase IV SELF Location: Total Depth: 23.25 None Sample Type: Diameter: Not Applicable Casing: Depth: Not Applicable Diameter: Interval: Screen: Notes: Not Applicable Material: DEPTH BELOW LITHOLOGY DESCRIPTION LSD (FEET) Grass & Roots, fine sand, light grey, slightly silty 0 - 1' Fine sand, light to dark grey, slightly silty, dark grey to black ash near bottom 1 - 3' Dark grey to black ash mixed with waste such as wood, metal, plastic, and tire chips 3 - 19 Dark grey to black ash material mixed with waste material and traces of sand 19-19.5 Grading dark to light grey sand, slightly silty, with no waste materials 19.5 - 20' **BEGIN SPLIT SPOON SAMPLING** Grey sand, poorly sorted, good spoon sample 20 - 20.5 Grey sand, poorly sorted, good spoon sample 20.5 - 21' Grey sand, poorly sorted, good spoon sample 21 - 21.5 Grey sand, Spoon dropped 1 ft. with three hammer blows, very little sample in spoon 21.5 - 22.5 Grey sand, very little sample in spoon, clay was evident on outside of the spoon. 22.5 - 23.25

The hole was cleaned out to a total depth of 23.25 feet, and the augers were tripped out for inspection. Clay was evident on the bottom 6 to 8 inches of the auger flight. A discussion among the on site engineer Larry Ruiz of SCS Engineers, the County's hydrologist David Adams, and the driller David Teslicko of Law Engineering, concluded that the top of clay layer was not clearly defined, and it had been penetrated, therefore the decision was made to move on to the alternate location ALT-2

## HILLSBOX H COUNTY DEPARTMENT OF SOI WASTE MANAGEMENT AND ENVIRONMENTAL SERVICES

### LITHOLOGY DESCRIPTION PIEZOMETER LOCATION ALT-2

LITHOLOGY DESCRIPTION

Well No: Piexometer ALT-2
Project: Southeast Landfill
Location: Phase IV SELF
Sample Type: Mone
Casing: Depth: 22.5'
Screen: Interval: 20.5 - 22.5'
Material: FVC Sch-80

DEPTH BELOW

LSD (FERT)

Date Drilled: July 5, 1995
Driller: David Teslicko - Law
Recorded by: David Adams
Total Depth: 22.5'
Diameter: 4-inch
Diameter: 4-inch
Notes:

0 - 1'	Grass & Roots, fine sand, light grey, slightly silty
1 - 3'	Fine sand, light to dark grey, slightly silty, dark grey to black ash near bottom
3 - 19'	Dark grey to black ash mixed with waste such as wood, metal, plastic, and tire chips
19-19.5'	Dark grey to black ash material mixed with waste material and traces of sand
	BEGIN SPLIT SPOON SAMPLING
19.5 - 20'	Grey sand, poorly sorted, good spoon sample
20 - 20.5'	Grey sand, poorly sorted, good spoon sample
20.5 - 21'	Grey sand, poorly sorted, good spoon sample
21 - 21.5'	Grey sand, poorly sorted, good spoon sample
21.5 - 22'	Grey sand, poorly sorted, good spoon sample
22 - 22.5'	Grey sand to light grey sand (approx. 1.5 inches in bottom of spoon shoe)

The top of clay was clearly defined at 22.5 feet below land surface (bls). The borehole was then cleaned out to approximately 22.5 feet bls, and the piezometer was set at this depth. The auger flights were then tripped out and inspected, and a trace of clay was evident on the very bottom. This observation further supported the top of clay being defined at 22.5 feet bls.

### **ATTACHMENT 2**

Environmental Consultanis

3012 F.S. Hallowry 301 North. Salts 200

kmpg D 336622.542

### SCS ENGINEERS

July 14, 1995 File No. 0990018,35

Patricia V. Berry Hillsborough County Department of Solid Waste P. O. Box 1110 Temps, Florida 33601

Subject:

Southeast County Landfill Flazometer Data Review

Dear Patty:

On July 5, 1995, a plezometer was installed in Phase IV to monitor the leachate depth over the liner in the Southeast County Landfill (SELF). The plezometer was constructed as shown on Figure 1. On July 6, 1995, the piezometer was surveyed by the county's land surveyor and on July 7,1995, the piezometer was developed by personnel from the Hillsborough County Department of Solid Waste (HCDSW). The piezometer was monitored on July 7 and July 10, 1995, indicating leachate depths of 53 inches and 58 inches, respectively.

Figure 2 shows the approximate top of day contours presented in the pending permit application. Figure 2 was compiled from settlement calculations and field exploration data obtained in December 1993 and February 1994. The available data suggested that the low point in the landfill was in the area of Pump Station No. 3 (TPS3). Data from the recent installation of the piezometer indicates that the low point of the landfill apparently is just to the south of TPS3 as shown in Figure 3. We believe this is a temporary condition and that the final low point will still occur in Phase VI as originally projected by Ardaman and Associates, Inc.

The current condition is preventing some leachate from being conveyed to TPS3. In order to bring the leachate depth within the low point to the depth required by the Florida Department of Environmental Protection (FDEP), SCS recommends that the HCDSW proceed with a phased action plan as follows:

Install a temporary suction pump in TPS3 with a suction line that will reach the
leachate within the low area. The leachate collection pipe discharging into TPS3
from Phase IV intersects the existing low area. After the suction pump is activated,
the leachate depth in the plezometer should be monitored daily. If a downward
trend in the leachate depth is observed, then a permanent suction pump should be
installed in TPS3. SCS understands that this action was already implemented by
the HCDSW on July 13, 1995.



81.

1...

Patricia V. Serry July 14, 1995 Page 2

> If the suction pump does not reduce the leachate depth, then a new temporary pump station should be installed within the low area in Phase IV.

Based on the new estimated top of clay contours of the low area as shown in Figure 3 and the recent piezometer readings, SCS estimates that approximately 9.5 million gallons of leachate must be removed to lower the leachate depth in the piezometer to 24 inches (Figure 4). As stated in correspondence dated December 16, 1995, from the HCDSW to the FDEP and previous hauling quantities, the SELF leachate collection system can provide for the removal of 150,000 gallons per day (gpd) until recharging through the drainage layer becomes the controlling factor. We estimate that at a removal rate of 150,000 gallons per day, approximately 3 to 4 months of pumping will be required to meet the 24-inch leachate depth objectives (Figure 5).

Please do not hesitate to call if you have any questions.

Very truly yours,

Larry E. Auiz

Senior Project Engineer

Robert B. Gardner, P.E.

Vice President

CS ENGINEERS

ER/RBG:lkm

Attachments

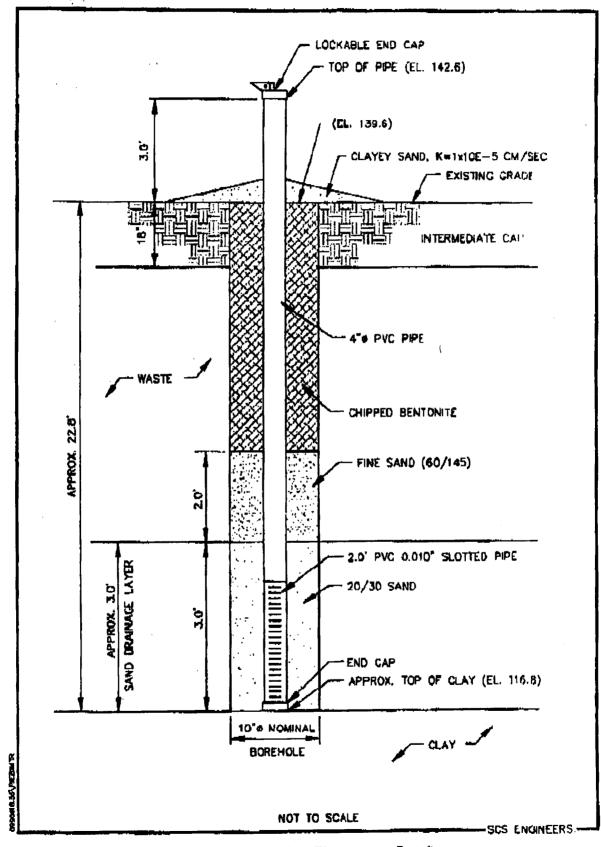


Figure 1. Existing Piezometer Detail.

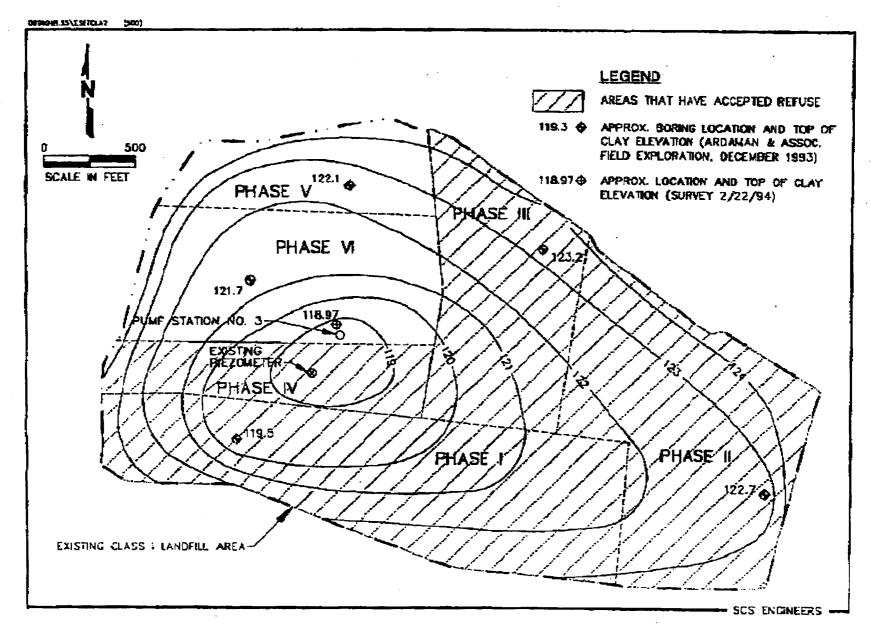


Figure 2. Approximate Top of Clay Elevation.

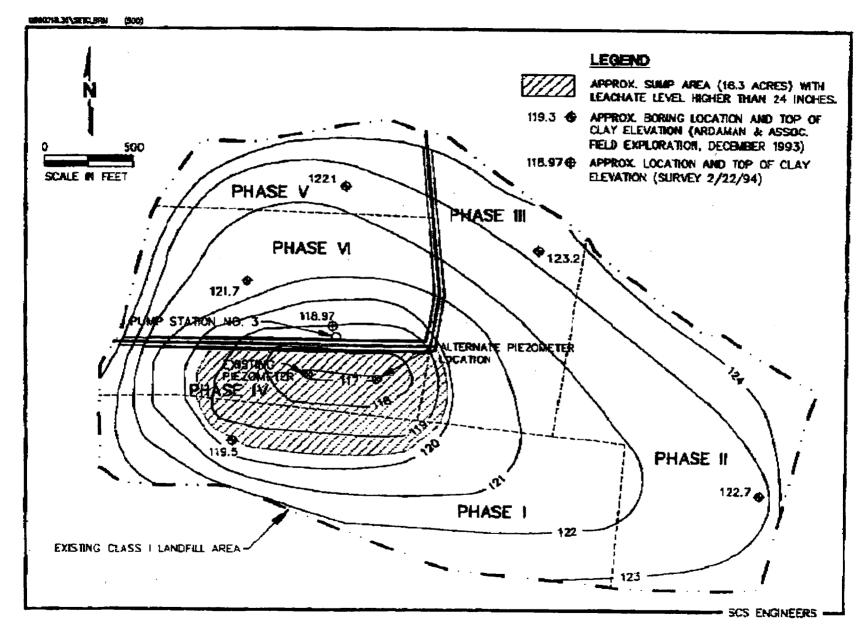
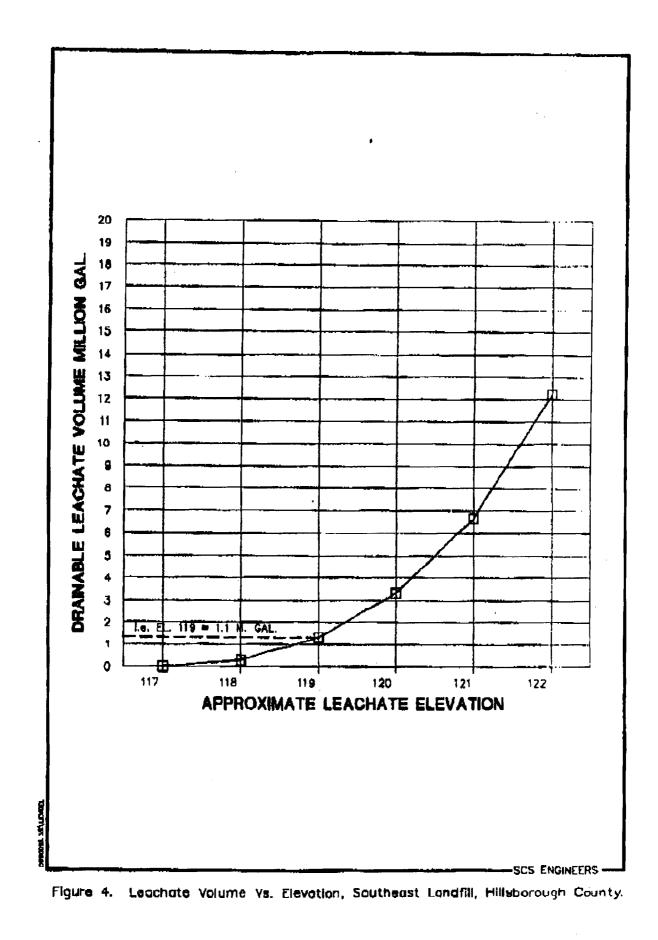
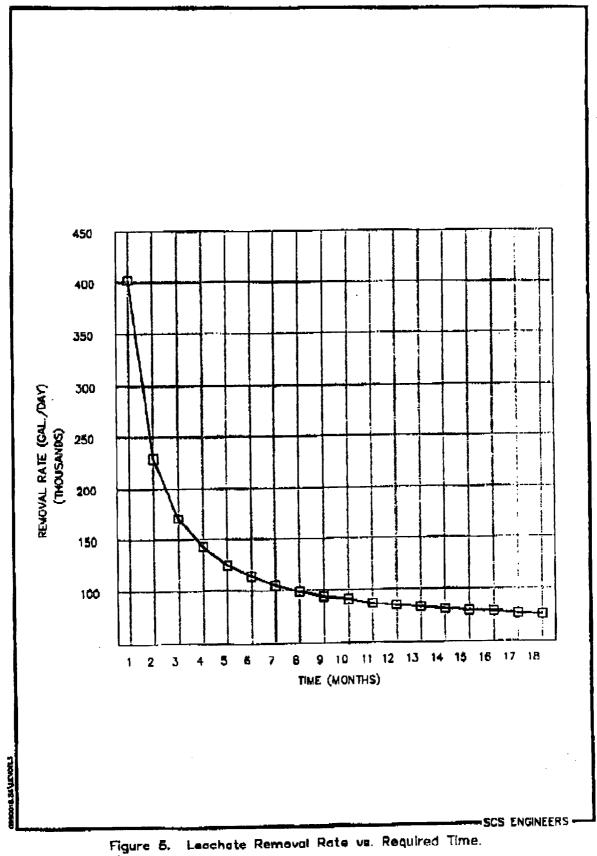


Figure 3. Existing Limit of Sump Area.





TO:	DATE DAMEN	12-11-5	195- 10
	COMPANY NAME FAX NUMBER PHONE NUMBER:	3: <u>744-</u>	6125
		SCS	ENGINEERS
nvironmental Consult	Suite 7	.S. Highway 301 North 30 Florida 33619	Phone 813 521-0080 FAX 813 523-675
· IOB/OV	FROM: /ERHEAD NUMBER:	1000 A	Voil
•	UMBER OF PAGES:	3	
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#### LEACHATE WATER BALANCE REPORT FORM MAY 1995 ANDFILL HILLSBOROUGH COUNTY, FL

							SOUTHEA	ST COUNTY I	LANDFILL, H	ILLSBOROUGH	4 COUNTY, F	L Xl	XII	XIII	XIV	XV	XVI
				166	IV	V	VI	VH.	VIII	IX.	Λ	Leachate	Effluent	Ain	Effluent	Total	
				III T	Depth in	st. Depth	Est.	Leachate	Leachate	Leachate	Total Leachate	Recit-	Pone	Effluent	Recir-	Effluent	Landfill
					Effluent	Over :	Lanofill	Pumped	n 500K	Treated	PERSONAL PROPERTY AND LAND.	outation	Storage	Sprayed	culation	Hauled	Evapor.
- 1		Area		Rainfall	Pond	Liner	Storage	to LTRF	Tank	at LTRF	Hauled (gal.)	(gal.)	(gal.	(gal.)	(gal.)	(gal.)	(gal.)
-		acres	int.	(in.)	(in.)	(in.)	{gal.}	(gal.)	(gal.)	(gal.)	69,000	Q O	68,000	49,000		25,000	40,000
741			92.2	0.0	22.0	15.0	1,115,000	193,000	317,000	52,000	62,000	0	55,000	49,000	0	12,000	40,000
	23.2	5.0	92.2	0.0	18.0	15.0	1,115,000	45,000	259,000	40,000	37,000	0	71,000	49,000	0		40,000
2	23.2	5.0	92.2	0.0	23.0	15.0	1,115,000	82,000	259,000	44,000	62,000	o	75,000	49,000	0	19,000	40,000
31	23.2	5.0	92.2	0.0	24.0	15.0	1,115,000	69,000	230,000	36,000	56,000	0	92,000	49,000	0	25,000	40,000
4	23.2	5.0	92.2	0.8	29.0	16.0	1,189,000	74,000	202,000	46,000	37,000	0	55,000	0	0	18,000	0
	23.2		92.2	0.0	18.0	16.0	1,189,000	53,000	173,000	44,000	37,000		NR	0	0	0	C
6	23.2	5.0	92.2	0.0		15.0	1,115,000	40,000	173,000	40,000	68,000	0	113,000	49,000	0	25,000	40,000
7	23.2	5.0	92.2	0.0	35.0	15.0	1,115,000	115,000	173,000	47,000	The second of the second of	0	102,000	40,000	0	19,000	32,000
8	23.2	5.0	92.2	0.0	32.0	15.0	1,115,000	88,000	173,000	45,000	43,000	0	92,000	40,000	0	25,000	32,000
9	23.2	5.0	92.2	0.0	29.0	20.0	1,609,000	41,000	144,000	45,000	12,000	0	92,000	40,000	0		32,000
1.0	23.2	5.0	92.2	0.0	29.0	17.0	1,264,000	NR PM	115,000	NR		0	81,000	40,000	0	31,000	32,000
11	23.2	5.0	92.2	-	20.0	17.0	1.264,000	93,000	144,000	45,000	18,000	_	NR STORE	0	0	0	0
12	23.2	5.0	92.2	_		10.0	1,189,000	78,000	173,000	49,000	0		NR	0		0	0
13	23.2	5.0	92.2	_	MD	NR	NR	NR	NR	43,000		-		49,000		25,000	40,000
14	23.2	5.0	92.2			16.0		190,000	230,000	46,000	44,000 50,000			49,000		19,000	40,000
15		5.0			28.0	16.0	1,189,000	65,000	202,000	44,000		_		49,000		25,000	40,000
16		5.0	92.2					80,000	179,000	45,000				38,000	0	31,000	31,000
17	STREET, SQUARE	5.0		-			1,189,000	64,000	173,000	45,000				38,000	0	37,000	31,000
18		5.0		-			1,189,000	NR	202,000		13,000	-		0		0	0
19		5.0						46,000	202,000	46,000				O		0	0
20		5.0	-	And in case of the last of the			NR	NR	NR	45,000			The second of th	38,000	0	25,000	31,000
21		5.0		_			1,115,000	NR	259,000	NR	43,000			49,000			40,000
22		5.0	-	-	-	-	1,189,000	36,000	230,000					49,000			40,000
23		5.0				-		NR	230,000	NR	31,000			49,000		38,000	40,000
24			-	-	The second second second				230,000					49,000			40,000
25		5.0				-			230,000	45,000	12,000			0	-		0
26					AL RESIDENCE PROPERTY.			NR	259,000	MR			NR	o		0	
27			-	-	NR .	NR	NR	NR	NR	45,000				0	_	37,000	
28		5.0		_			1,115,000	125,000	288,000	45,000				49,000		31,000	40,000
29	-	5.0		-				NR	288,000		37,000			49,000			40,000
30		5.0		-					288,000	45,000	25,000	-	30,000	10,300			
3	23.2	5.0	92.	2 0.0	10.0	1					000 000		2,072,000	1,009,000	0	855,000	821,000
	+	-		2.40	681.0	441.	32,900,000	1,761,000	8,019,000				77,000		0	21.000	26,000
Total		+	-	0.00		-			2'5,000	45,000	28,000		77,000	00,000		by BWP, 4/	
Daily Av	3			0.00	24.1	101									31011111	# (P. 1970)   1   1   1   1   1   1   1   1   1	

- 1. NF = No Records.
- 2. Column it, total area with waste is 120.4 acres (Phases -IV).
- 3. Columns III and IV, field measured.
- 4. Column V. estimated from depth in Phase IV riser.
- 5. Column VI, estimated from Column V and approximate volume with top of clay elevation at 118.5 feet.
- 6. Column VII, calculated from Column IX + Column X + Change in Storage of 500,000 gal. rank.
- 7. Column VIII, calculated from depth in 500,000 gal. leachate tank
- 8. Columns IX and XIII, quantities from flow meters.
- 9. Columns X, XI, XIV, and XV, quantities calculated from truck weight.
- 10. Column XYI, 80.8% of the daily values from Columns XI, XIII and XIV.

# DRAFT

#### YEAR TO DATE LEACHATE BALANCE SUMMARY SOUTHEAST COUNTY LANDFILL HILLSBOROUGH COUNTY, FLORIDA

	_			Leachate/F	ffluent Leaving L	TRF		Inflow/Out	flow Balance Fo	r LTRF
	Leach	hate Arriving at LTRF		Total Eff.	Leachate Rec.	Effluent	Effluent	Total Inflow	Total Outflow	Balance
		1	Total Leach. Hauled From LTRF	Hauled	From LTRF	Rec.	Sprayed	To LTRF	From LTRF	For Month
	'	Pumped to LTRF	{gaL}	(gal.)	(gal.)	(gal.	(gal.)	(gal.)	(gal.)	(gal.)
Month	N. 4	igai.) 3,104,000	3,166,000	NR	0	0	0	3,104,000	3,166,000	(62,000
lan	2.4	4,063,000		NR	0	0	650,000	4,063,000	3,592,000	471,000
eb	11.4	3,385,000		NR	0	113,000	932,000	3,385,000	3,365,000	20,000
<u>vlarch</u>	1.6			393,000	60,000	0	700,000	2,625,000	2,277,000	348,000
April	2,4	0.300.000		655,000	0	0	1,009,000	1,761,000	2,526,000	(765,000
May	123	2,311,000	1 4 6 6	758,000						
JUME	01/	1		1,048,000	60,000	113,000	3,291,000	14,938,000	14,926,000	12,000
YTD Tota	1	14,938,000	10,414,000	1,048,000	60,000	113,000	3,291,000	14,938,000	14,520,000	

Notes:

# DRAFT

<sup>1.</sup> If the effluent bypass is ever used to pump effluent back to the LTRF, this table must be modified.

HILLSBOROUGH COUNTY

Florida

Office of the County Administrator Daniel A. Kleman

BOARD OF COUNTY COMMISSIONERS Dottie Berger Phyllis Busansky Joe Chillura Chris Harr Jim Norman Ed Turanchik

Sandra Helen Wilson



Senior Assistant County Administrator Patricia Bean

Assistant County Administrators Edwin Hunzeker Crerra Johnson limmie Keel

Robert Taylor

June 16, 1995

Mr. Kim Ford, P.E. Solid Waste Permitting Florida Department of Environmental Protection 3804 Coconut Palm Drive Tampa, Florida 33619

Department of Environmental Protection

SOUTHWEST DISTRICT

RE: Southeast County Landfill - Leachate Management

Dear Mr. Ford:

In accordance with the Hillsborough County Department of Solid Waste's (DSW) Leachate Management Plan for the Southeast County Landfill (Landfill), the DSW is providing the May 1995 Water Balance Report Form for the Landfill. In addition, the DSW is providing the May 1995 effluent and leachate field data forms for the Landfill and the daily leachate and collection system evaluation reports. This submittal also includes the Phase IV Riser Hydrograph for May 1995.

This information is being provided to the Florida Department of Environmental Protection (DEP) and the Hillsborough County Environmental Protection Commission as an update on the DSW's leachate management efforts for the Landfill. This information is being provided in response to both the permitting and enforcement issues at hand.

Should you have any questions concerning the information provided, please call at 276-2908.

Sincerely

Patricia V. Berry

Landfill Services Section Manager

U. Benz

Department of Solid Waste

Attachments

xc: Matt Matthews, DSW Steve Hamilton, SCS Steve Morgan, DEP Paul Schipfer, EPC

Post Office Box 1110 · Tampa, Florida 33601 An Affirmative Action/Equal Opportunity Employer

#### LEACHATE WATER BALANCE REPORT FORM MAY 1995

#### SOUTHEAST COUNTY LANDFILL, HILLSBOROUGH COUNTY, FL

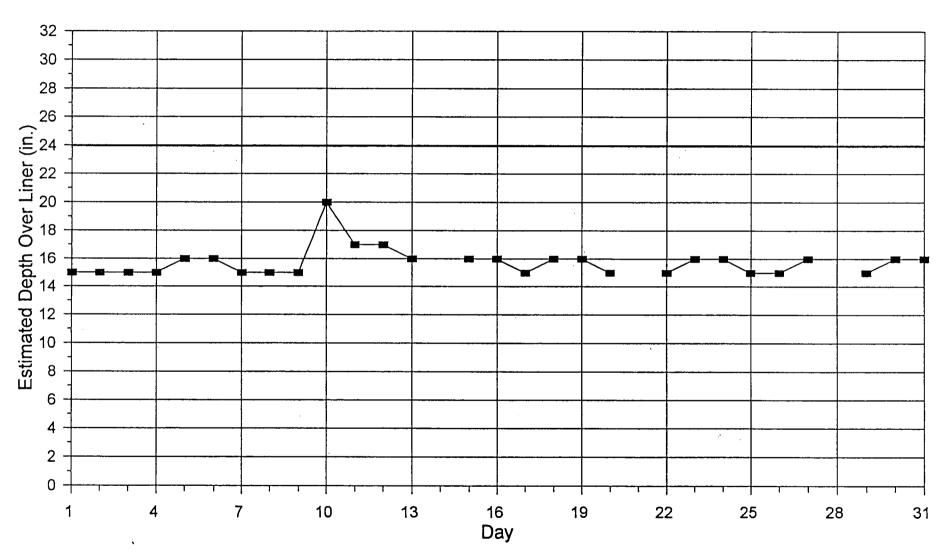
	-			111	IV	V	VI	VII	VIII	IX	X	. XI	XII	XIII	XIV	XV	XVI
						Est. Depth		Leachate	Leachate	Leachate	Total	Leachate	Effluent	I	Effluent	Total	
		Area			Effluent	Over	Landfill	Pumped	in 500K	Treated	Leachate	Recir-	Pond	Effluent	Recir-	Effluent	Landfill
_		(acres)		Rainfall	Pond	Liner	Storage	to LTRF	Tank	at LTRF	Hauled -	culation	Storage	Sprayed	culation	Hauled	Evapor.
Day	THE RESERVE OF THE PERSON NAMED IN	active	int.	(in.)	(in.)	(in.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)	(gal.)
	23.2	5.0	92.2	0,0	22.0			193,000	317,000	52,000	69,000	0	68,000	49,000	0	25,000	40,000
2	23.2	5.0	92.2	0.0				45,000	259,000	40,000	62,000	0	55,000	49,000	0	12,000	40,000
3	23.2	5.0	92.2	0.0	23.0			82,000	259,000	44,000	37,000	0	71,000	49,000	0	25,000	40,000
4	23.2	5.0	92.2	0.0	24.0	The second second second second second		69,000	230,000	36,000	62,000	0	75,000	49,000	0	19,000	40,000
5	23.2	5.0	92.2	0.6	29.0			74,000	202,000	48,000	56,000	0	92,000	49,000	0	25,000	40,000
6	23.2	5,0	92.2	0.0		-		53,000	173,000	44,000	37,000	0	55,000	0	0	18,000	0
7	23.2	5.0	92.2	0.0		15.0		40,000	173,000	40,000	0	0	NR	0	0	0	
8	23.2	5.0	92.2	0.0				115,000	173,000	47,000	68,000	0	113,000	49,000	0	25,000	40,
9	23.2	5.0	92.2	0.0				88,000	173,000	45,000	43,000	0	102,000	40,000	0	19,000	32,000
10	23.2	5.0	92.2	0.0	29.0			41,000	144,000	45,000	25,000	0	92,000	40,000	0	25,000	32,000
11	23.2	5.0	92.2	0.0			1,264,000	4,000	115,000	20,000	12,000	0	92,000	40,000	0	31,000	32,000
12	23.2	5.0	92.2	0.0		17.0	1,284,000	93,000	144,000	45,000	18,000	0	61,000	40,000	0	31,000	32,000
13	23.2	5.0	92.2	0.0		16.0	1,189,000	78,000	173,000	49,000	0	0	NR	0	0	0	02,000
14	23,2	5.0	92.2	0.0	NR	NR	NR	NR	NR	43,000	0		NR	0	0	0	0
15	23.2	5.0	92.2	0.0	32.0		1,189,000	190,000	230,000	46,000	44,000	0	102,000	49,000	0	25,000	40,000
16	23.2	5.0	92.2	0.0	28.0	16.0	1,189,000	65,000	202,000	44,000	50,000	0	88,000	49,000	0	19,000	40,000
17	23.2	5.0	92.2	0.0	26.0	15.0	1,115,000	60,000	173,000	45,000	43,000	0	81,000	49,000	0	25,000	40,000
18	23.2	5.0	92.2	0.0	22.0	16.0	1,189,000	64,000	173,000	45,000	19,000	0	68,000	38,000	0	31,000	31,000
19	23.2	5.0	92.2	0.0	15.0	16.0	1,189,000	59,000	202,000	18,000	13,000	0	45,000	38,000	0	37,000	31,000
20	23.2	5.0	92.2	0.9	16.0	15.0	1,115,000	48,000	202,000	46,000	0 ·	. 0	49,000	0	0	0	0 1,000
21	23.2	5.0	92.2	0.2	20.0	NR	NR	NR	NR	45,000	0	0	61,000	0	0	0	0
22	23.2	5.0	92.2	0.0	38.0	15.0	1,115,000	170,000	259,000	24,000	43,000	0	124,000	38,000	0	25,000	31,000
23	23.2	5.0	92.2	0.0	33.0	16.0	1,189,000	36,000	230,000	46,000	19,000	0	108,000	49,000	0	19,000	40,000
24	23.2	5.0	92.2	0.0	29.0	16.0	1,189,000	31,000	230,000	0	31,000	0	92,000	49,000	0	25,000	40,000
25	23.2	5.0	92.2	0.0	26.0	15.0	1,115,000	78,000	230,000	45,000	31,000	. 0	81,000	49,000	0	38,000	40,000
26	23.2	5.0	92.2	0.0	18.0	15.0	1,115,000	58,000	230,000	45,000	12,000	0	55,000	49,000	0	63,000	40,000
27	23.2	5.0	92.2	0.0	10.0	16.0	1,189,000	34,000	259,000	5,000	0	. 0	30,000	43,000	0	03,000	
28	23.2	5.0	92.2	0.7	NR		NR	NR	NR	45,000	0		NR	0	0	0	0
29	23.2	5.0	92.2	0.0	26.0	15.0	1,115,000	125,000	288,000	45,000	6,000	0	81,000	0	0	37,000	
30	23.2	5.0	92.2	0.0	24.0	16.0	1,189,000	39,000	288,000	1,000	37,000	0	75,000	49,000	0		40 000
31	23.2	5.0	92.2	0.0	19.0	16.0	1,189,000	70,000	288,000	45,000	25,000	0	58,000	49,000	0	31,000	40,000
						.510	.,,,,,,,,,	,0,000	200,000	43,000	23,000		56,000	49,000	- 0	25,000	40,000
otal				2.40	661.0	441.0	32,900,000	2,098,000	6,019,000	1,186,000	862,000	0	2,072,000	1 000 000		OFF DOG	004.000
aily Avg				0.08	24.5	15.8		68,000	215,000	38,000	28,000	0	the state of the s	1,009,000		655,000	821,000
A L		- Proposition		0,00	24,0	10.0	1,170,000	00,000	210,000	36,000	28,000	0	77,000	33,000	0 Revised by	21,000	26,000

#### Notes:

- 1. NR = No Records.
- 2. Column II, total area with waste is 120.4 acres (Phases I-IV).
- 3. Columns III and IV, field measured.
- 4. Column V, estimated from depth in Phase IV riser.
- 5. Column VI, estimated from Column V and approximate volume with top of clay elevation at 118.5 feet.
- 6. Column VII, calculated from Column IX + Column X + Change in Storage of 500,000 gal. tank.
- 7. Column VIII, calculated from depth in 500,000 gal. leachate tank.
- 8. Columns IX and XIII, quantities from flow meters.
- 9. Columns X, XI, XIV, and XV, quantities calculated from truck weight.
- 10. Column XVI, 80.8% of the daily values from Columns XI, XIII and XIV.

Revised by BWP, 4/13/95.

#### PHASE IV RISER HYDROGRAPH FOR MAY SOUTHEAST COUNTY LANDFILL



Note: If the estimated depth shows an upward trend above 24 inches, increase the leachate removal rate.

ate: hspector:	W. Wallhim	Rainfall:	0.0
`	se IV Is Riser Phase IV below 27.6 Yes: In compliance. No: Increase leachate Contact supervise	removal required.	
1	er Phase IV  Is Piezometer Phase IV below  Yes PA: In compliance.  No: Increase leachate  Contact supervise	w 27.6 inches (2.3 feet)?	ë :
Sump No.	4 Phase VI (Stormwater) : Normal Operation : If level is less than level	vel in Riser Phase IV, sto	p pumping to Basin D.
500,000 G - - -	Gallon Tank at LTRF : Normal Operation. : If level is greater than : If level is less than 6 to	11 feet, increase treatm	nent, hauling, or recirculation. uling/ recirculation.
Effluent Po	Normal Operation. : If level is 6 inches or I	ess, stop irrigation/ recir 4 feet, increase irrigatio	culation/hauling n/ recirculation/hauling
If Yes: Co	runoff of effluent to stormw ontact supervisor immediatel op spray irrigation immediat	ater basins? (Yes/No)	,
	Runoff Type Severe Moderate Minor	To Basin A B C D	· · · · · · · · · · · · · · · · · · ·
omments/F	Remedial Action:		

Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes	Date: nspector:	M. Mathem Rainfall:
Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes **/*** In compliance. No: Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater): Normal Operation: If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallop Tank at LTRF: Normal Operation: If level is greater than 11 feet, increase treatment, hauling, or recirculation: If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond: Normal Operation: If level is 6 inches or less, stop irrigation/ recirculation/hauling: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes Normal Operation:  Runoff Type To Basin Severe A Moderate B Minor C D		Is Riser Phase IV below 27.6 inches (2.3 feet)? Yes: In compliance. No: Increase leachate removal required.
Normal Operation   If level is less than level in Riser Phase IV, stop pumping to Basin D.    Soo,000 Gallop Tank at LTRF   Normal Operation.   If level is greater than 11 feet, increase treatment, hauling, or recirculation.   If level is less than 6 feet, decrease or stop hauling/ recirculation.		Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes MA: In compliance. No: Increase leachate removal required. Contact supervisor immediately.
: If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yeo(No)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	<u> </u>	: Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.
Normal Operation.   If level is 6 inches or less, stop irrigation/ recirculation/hauling   If level is greater than 4 feet, increase irrigation/ recirculation/hauling.    Observed runoff of effluent to stormwater basins? (Yeo/No)    If Yes: Contact supervisor immediately.   Stop spray irrigation immediately and provide the following information:    Runoff Type		: Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation.
If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type  Severe  Moderate  Minor  C  D	Effluent P	: Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling
Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	Observed	runoff of effluent to stormwater basins? (Yealto)
Severe A Moderate B Minor C D		
omments/Remedial Action:		Severe A Moderate B Minor C
	omments/	Remedial Action:

•		SOUTHEAST CO	UNTY LAND	FILL		
Date:	5-27-95 M Want		Rainfall:		0	
Yes	Riser Phase IV below:  S: In compliance  : Increase leach	:. nate removal red	quired.			
Yeş	·	nate removal rec	es (2.3 feet)? quired.		41. 41.	
	Phase VI (Stormwar : Normal Operation : If level is less than	•	hase IV, stop	o pumping	to Basin D.	
	on Tank at LTRF : Normal Operation. : If level is greater t : If level is less thar	han 11 feet, inc	crease treatm se or stop ha	ent, haulin uling/ recirc	g, or recirci	ulation.
Effluent Pond	: Normal Operation. : If level is 6 inches : If level is greater t	or less, stop irri	igation/ recir ease irrigation	culation/ha	uling tion/hauling	) <b>.</b>
If Yes: Conta	off of effluent to stor act supervisor immed spray irrigation imme	ately.		ving inform	ation:	
	Runoff Type Severe Moderate Minor	To Basi A B C	<b>.</b>			
Comments/Rem	nedial Action:					

spector:	W. Watthen	Rainfall:	0.0
Riser Phas			
	ls Riser Phase IV below 27	7 6 inches (2.3 feet)?	
,	Yes : In compliance.	7.0 menes (2.0 feet/)	
	No: Increase leacha	ate removal required.	
		isor immediately.	
Piezomete	r Phase IV	<u> </u>	
		low 27.6 inches (2.3 feet)?	
,	Yes MA: In compliance.	iow 27.6 inches (2.3 feet)?	
ſ	No: Increase leacha	ite removal required	
		isor immediately.	
			·
C Al	4.51	· · · · · · · · · · · · · · · · · · ·	· .
Sump No.	4 Phase VI (Stormwater	r)	
-	Normal Operation		
	il level is less than i	level in Riser Phase IV, stop	pumping to Basin D.
500,000 (	Sallon Tank at LTRF	•	
	: Normal Operation.		
		an 11 feet, increase treatme	ent, hauling, or recirculation.
	: If level is less than t	6 feet, decrease or stop had	uling/ recirculation.
Effluent De			
Effluent Po	ond		
Effluent Po	ond : Normal Operation.		
Effluent Po	ond : Normal Operation. : If level is 6 inches o	or less, stop irrigation/ recirc	culation/hauling
- -	ond  : Normal Operation. : If level is 6 inches o : If level is greater tha	or less, stop irrigation/ recirc an 4 feet, increase irrigation	ulation/hauling // recirculation/hauling.
-	ond : Normal Operation. : If level is 6 inches o	or less, stop irrigation/ recirc an 4 feet, increase irrigation	culation/hauling n/ recirculation/hauling.
Observed i	ond  Normal Operation.  If level is 6 inches o  If level is greater that	or less, stop irrigation/ recirc an 4 feet, increase irrigation awater basins? (Yes	culation/hauling n/ recirculation/hauling.
Observed of the second of the	Normal Operation. : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediate	or less, stop irrigation/ recirc an 4 feet, increase irrigation awater basins? (Yes	n/ recirculation/hauling.
Observed of the second of the	Normal Operation. : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediate	or less, stop irrigation/ recirc an 4 feet, increase irrigation awater basins? (Yes	n/ recirculation/hauling.
Observed of the second of the	Normal Operation. : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediators on spray irrigation immediates	or less, stop irrigation/ recirc an 4 feet, increase irrigation twater basins? (Yes No) tely. ately and provide the follow	n/ recirculation/hauling.
Observed of the second of the	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediate op spray irrigation immediate Runoff Type	or less, stop irrigation/ recirc an 4 feet, increase irrigation awater basins? (Yes) tely. ately and provide the follow To Basin	n/ recirculation/hauling.
Observed of the second of the	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediate op spray irrigation immediate  Runoff TypeSevere	or less, stop irrigation/ recirc an 4 feet, increase irrigation awater basins? (Yes) tely. ately and provide the follow To Basin A	n/ recirculation/hauling.
Observed of	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm entact supervisor immediate op spray irrigation immediate  Runoff Type  Severe  Moderate	or less, stop irrigation/ recirc an 4 feet, increase irrigation twater basins? (Yes) tely. ately and provide the follow To Basin A B	n/ recirculation/hauling.
Observed of	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediate op spray irrigation immediate  Runoff TypeSevere	or less, stop irrigation/ recirc an 4 feet, increase irrigation twater basins? (Yes) tely. ately and provide the follow To Basin ——— A ——— B ——— C	n/ recirculation/hauling.
Observed of the second of the	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm entact supervisor immediate op spray irrigation immediate  Runoff Type  Severe  Moderate	or less, stop irrigation/ recirc an 4 feet, increase irrigation twater basins? (Yes) tely. ately and provide the follow To Basin A B	n/ recirculation/hauling.
Observed in the second of the	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediate op spray irrigation immediate  Runoff Type  Severe  Moderate  Minor	or less, stop irrigation/ recircles 4 feet, increase irrigation water basins? (Yes Note to be follow To Basin  A B C	n/ recirculation/hauling.
Observed in the second of the	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm entact supervisor immediate op spray irrigation immediate  Runoff Type  Severe  Moderate	or less, stop irrigation/ recircles 4 feet, increase irrigation water basins? (Yes Note to be follow To Basin  A B C	n/ recirculation/hauling.
Observed in the second of the	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediate op spray irrigation immediate  Runoff Type  Severe  Moderate  Minor	or less, stop irrigation/ recircles 4 feet, increase irrigation water basins? (Yes Note to be follow To Basin  A B C	n/ recirculation/hauling.
Observed of the state of the st	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediate op spray irrigation immediate  Runoff Type  Severe  Moderate  Minor	or less, stop irrigation/ recircles 4 feet, increase irrigation water basins? (Yes Note to be follow To Basin  A B C	n/ recirculation/hauling.
Observed of the state of the st	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediate op spray irrigation immediate  Runoff Type  Severe  Moderate  Minor	or less, stop irrigation/ recircles 4 feet, increase irrigation water basins? (Yes Note to be follow To Basin  A B C	n/ recirculation/hauling.
Observed of the state of the st	Normal Operation.  : If level is 6 inches o : If level is greater that runoff of effluent to storm ontact supervisor immediate op spray irrigation immediate  Runoff Type  Severe  Moderate  Minor	or less, stop irrigation/ recircles 4 feet, increase irrigation water basins? (Yes Note to be follow To Basin  A B C	n/ recirculation/hauling.

ate:	5-18-95		
spector:	M. Wallheim	_ Rainfall:	0.0
Riser Pha	se IV		
	Is Riser Phase IV below 27.6 in	ches (2.3 feet)?	
	Yes : In compliance.		
	No: Increase leachate rer	moval required.	
	Contact supervisor in	mmediately.	
Piezomet	er Phase IV		a ·
	Is Piezgmeter Phase IV below 2	7.6 inches (2.3 feet)?	
	Yes VA: In compliance.		•
	No: Increase leachate rer		
4 1 L	Contact supervisor in	nmediately.	and several to the second of the second of
Sump No	. 4 Phase VI (Stormwater)		
	Normal Operation		
	: If level is less than level i	n Riser Phase IV, stop p	oumping to Basin D.
500 000	Gallon Tank at LTRF		
000,000	: Normal Operation.		
		feet increase treatmer	nt, hauling, or recirculation.
	: If level is less than 6 feet	decrease or stop bauli	nd/recirculation
Effluent P			
	: Normal Operation.		
•	: If level is 6 inches or less : If level is greater than 4 f	et incresse irrigation/	racirculation/baulion
<del></del>			recirculation/mading.
Observed	runoff of effluent to stormwater	r basins? (Yes/Noj)	·
			`•
	ontact supervisor immediately.		
3	top spray irrigation immediately	and provide the following	ng information:
	Runoff Type	To Basin	
	Severe	A	·
	Moderate	—— B	
	Minor	c	
		D	
omments/	Remedial Action:		
•			
<del></del>		<del></del>	

#### DAILY LEACHATE COLLECTION AND RECOVERY SYSTEM **EVALUATION REPORT**

SOUTHEAST COUNTY LANDFILL

nspector:	In Hallheur	— Rainfall: □, □
Riser Phas	e IV	
	s Riser Phase IV below 27.6	inches (2.3 feet)?
``	es: In compliance.	menes (2.5 leet)
	No: Increase leachate r	removal required
	Contact supervisor	
Piezomete	r Phase IV	*
	s Piezometer Phase IV below	27 6 inches (2.3 feet)?
γ	es 2/2: In compliance.	27.0 Nones (2.0 fee())
V	lo: Increase leachate r	emoval required.
	Contact supervisor	
· .		
Sump No.	4 Phase VI (Stormwater)	
	: Normal Operation	•
-		I in Riser Phase IV, stop pumping to Basin D.
		The state of the s
	iallon Tank at LTRF	
_	Normal Operation.	
_	: If level is greater than 1	11 feet, increase treatment, hauling, or recirculation.
	: It level is less than 6 fe	et, decrease or stop hauling/ recirculation.
		<del></del>
Effluent Po	end	
Effluent Po _	nd : Normal Operation.	
Effluent Po  	: Normal Operation.	ss, stop irrigation/ recirculation/hauling
Effluent Po - - -	: Normal Operation. : If level is 6 inches or le	ss, stop irrigation/ recirculation/hauling I feet, increase irrigation/ recirculation/hauling.
<u>-</u> 	: Normal Operation. : If level is 6 inches or le. : If level is greater than 4	feet, increase irrigation/ recirculation/hauling.
<u>-</u> 	: Normal Operation. : If level is 6 inches or le	feet, increase irrigation/ recirculation/hauling.
Observed r	Normal Operation. : If level is 6 inches or le. : If level is greater than 4 unoff of effluent to stormwar	ter basins? (Yes(No)
Observed r	Normal Operation.  : If level is 6 inches or legarithms.  : If level is greater than 4 unoff of effluent to stormwarm that supervisor immediately.	ter basins? (Yes(No))
Observed r	Normal Operation.  : If level is 6 inches or legarithms.  : If level is greater than 4 unoff of effluent to stormwarm that supervisor immediately.	ter basins? (Yes(No)
Observed r	Normal Operation. : If level is 6 inches or lest in	ter basins? (Yes(No))  .  y and provide the following information:
Observed r	Normal Operation.  : If level is 6 inches or legarithms.  : If level is greater than 4 unoff of effluent to stormwarm that supervisor immediately.	ter basins? (Yes(No))
Observed r	Normal Operation. : If level is 6 inches or lest inches or lest inches or lest inches or lest inches or lest inches or lest inches or lest inches or lest inches or lest inches i	ter basins? (Yes No)  y and provide the following information:  To Basin
Observed r	Normal Operation.  : If level is 6 inches or less. : If level is greater than 4 unoff of effluent to stormward that supervisor immediately op spray irrigation immediately Runoff Type  Severe	ter basins? (Yes(No))  .  It y and provide the following information:  To Basin  A
Observed r	Normal Operation.  : If level is 6 inches or less. : If level is greater than 4  unoff of effluent to stormwar  ntact supervisor immediately op spray irrigation immediatel  Runoff Type  Severe Moderate	ter basins? (Yes(No))  .  If y and provide the following information:  To Basin  A  B
Observed r	Normal Operation.  : If level is 6 inches or less. : If level is greater than 4  unoff of effluent to stormwar  ntact supervisor immediately op spray irrigation immediatel  Runoff Type  Severe Moderate	ter basins? (Yes(No))  y and provide the following information:  To Basin  A  B  C
Observed r	Normal Operation.  : If level is 6 inches or less. : If level is greater than 4  unoff of effluent to stormwar  ntact supervisor immediately op spray irrigation immediatel  Runoff Type  Severe Moderate	ter basins? (Yes(No))  It y and provide the following information:  To Basin  A B C C D
Observed r	Normal Operation.  : If level is 6 inches or lest i	ter basins? (Yes(No))  It y and provide the following information:  To Basin  A B C C D
Observed r	Normal Operation.  : If level is 6 inches or lest i	ter basins? (Yes(No))  Ity and provide the following information:  To Basin  A B C C D
Observed r	Normal Operation.  : If level is 6 inches or lest i	ter basins? (Yes(No))  It y and provide the following information:  To Basin  A B C C D
Observed r	Normal Operation.  : If level is 6 inches or lest i	ter basins? (Yes(No))  Ity and provide the following information:  To Basin  A B C C D

#### DAILY LEACHATE COLLECTION AND RECOVERY SYSTEM EVALUATION REPORT

SOUTHEAST COUNTY LANDFILL

ate:	9/16/95				
spector:	M. Malhein	<u> </u>	Rainfall:	0.0	
Riser Phase	IV		<del></del> .	<del> </del>	·
ls	Riser Phase IV below 27.	.6 inches (2.3	feet)?		
Ye	s: In compliance.	,			
No	: Increase leachat				
	Contact supervis	sor immediatel	ly.	· · · · · · · · · · · · · · · · · · ·	<u> </u>
Piezometer I				<u>설</u> :	
ls	Piezometer Phase IV belo	w 27.6 inche:	s (2.3 feet)?		
Ye	s AA: In compliance.			•	•
No	: Increase leachate				
11.4 g = 4 s	Contact supervis	sor immediatel	<b>y.</b>		e de se
Sump No. 4	Phase VI (Stormwater)		<del></del>		<del></del>
Sump No. 4	: Normal Operation	,			
	: If level is less than le	ovel in Riser Ph	nasa IV: stop p	impina to Bacin	n
<u> </u>			iase 14, stop pi	omping to basin	<del></del>
	llon Tank at LTRF			• •	
	: Normal Operation.				
	: If level is greater that : If level is less than 6	n II teet, inci	rease treatmen	t, hauling, or rec	irculation.
Effluent Pond	: Normal Operation. : If level is 6 inches or : If level is greater than	less, stop irrig n 4 feet, incre	gation/ recircula ase irrigation/ r	ation/hauling ecirculation/haul	ing.
Observed rui	noff of effluent to stormy	vater basins?	(Yes No)		
If Yes: Cont	tact supervisor immediate	a.t			``
	spray irrigation immedia		de the followin	a information:	
0.04	opio / migation mancola	itely and provi	be the followin	y imormation.	
	Runoff Type	To Basir	1		
	Severe	A			
	Moderate	B			
	Minor	c			
		D			·
omments/Rei	medial Action:				<del>-</del>
			<del></del>		•
		· · · · · · · · · · · · · · · · · · ·			<u>.                                    </u>

Date:	3-15-95	<u></u>		
nspector:	M. Malher	<u> </u>	Rainfall:	0.0
Riser Pha:		<del></del>		
	Is Riser Phase IV below 2	27.6 inches (2.3	feet)?	
	Yes : In compliance			
	No: Increase leach	nate removal req visor immediate		
		VISOI IIIIIIEUIALE	····	<u> </u>
	er Phase IV			<b>5</b> (
	Is Piezometer Phase IV be	elow 27.6 inche	s (2.3 feet)?	
	Yes P/A: In compliance. No: Increase leach			·
	Contact cuped	iate removai req	uirea. N	
in the second	Contact super		ly.	
C	4.51		• • • • • • • • • • • • • • • • • • • •	<u> </u>
Sump No.	4 Phase VI (Stormwate	er)		
-	: Normal Operation	tavalia Diasa Di	N/ ·	
	: If level is less than	i level in Riser Pi	nase IV, stop pui	mping to Basin D.
500,000 (	Gallon Tank at LTRF	,		
-	: Normal Operation.			
-	: If level is greater the	han 11 feet, inc	rease treatment,	hauling, or recirculation.
	: If level is less than	6 feet, decreas	e or stop hauling	/ recirculation.
Effluent Po	ond			
_	: Normal Operation.			
-	: If level is 6 inches	or less, stop irri	gation/ recirculat	tion/hauling
	: If level is greater th	han 4 feet, incre	ase irrigation/ re	circulation/hauling.
Observed	runoff of effluent to storr	mustor basing?	(Va(Va)	
	remote of children to 2001	iiwatei Dasiiisi	(TEE/NOT	
If Yes: Co	ontact supervisor immedia	atelv.		`,
	op spray irrigation immed		de the following	information:
			_	1
	Runoff Type	To Basin	า	
	Severe	A		
	Moderate	B	•	
	Minor	c		
		D	· · · · · · · · · · · · · · · · · · ·	
omments/f	Remedial Action:			
•	iemediai Action:			· · · · · · · · · · · · · · · · · · ·
				•
	-			

Date: nspector:	21-12-95	Dain ta H	0.0
	· · · · · · · · · · · · · · · · · · ·	Rainfall:	
Riser Pha			
	Is Riser Phase IV below 27.6 inc	hes (2.3 feet)?	
	Yes: In compliance.		
	No: Increase leachate rem		
	Contact supervisor im	mediately.	
Piezomet	ter Phase IV		ម្ន <sup>រ</sup>
	Is Piezometer Phase IV below 27	.6 inches (2.3 feet)?	
	Yes: In compliance.		
	No: Increase leachate rem		
er grover	Contact supervisor im	mediately.	(1, 1, 2, 3, 3, 3, 3, 3, 3, 3, 3, 3, 3, 3, 3, 3,
· .	<u> </u>		
Sump No	o. 4 Phase VI (Stormwater)		
	: Normal Operation		•
	: If level is less than level in	Riser Phase IV, stop po	umping to Basin D.
500.000	Gallon Tank at LTRF		
	: Normal Operation.		
	: If level is greater than 11	feet increase treatment	t bauling or regiseulation
	: If level is less than 6 feet,	decrease or stop haulin	nd recirculation
Effluent f			
	: Normal Operation.		
	: If level is 6 inches or less,	stop irrigation/ recircula	ation/hauling
	: If level is greater than 4 fe	et, increase irrigation/ r	ecirculation/hauling.
Observed	runoff of effluent to stormwater	basins? (Yes/No)	
			•
	Contact supervisor immediately.		
S	Stop spray irrigation immediately a	nd provide the followin	g information:
	Pupoff Tupo	·	
		To Basin	
	Severe Moderate	A	
	Minor	B	
	will for	C	·
		D	
	/Damadial Assis		
·	/Remedial Action:		
· · · ·			· · · · · · · · · · · · · · · · · · ·
			-

	2-11-9		
nspector:	M. Walker	Rainfall:	0.0
Υ	s Riser Phase IV below 2 Yes: In compliance. No: Increase leach	ate removal required.	
		visor immediately.	· · · · · · · · · · · · · · · · · · ·
Y	s Piezopeter Phase IV be es: In compliance. lo: Increase leacha	ate removal required. visor immediately.	en marin di periodi di del
	4 Phase VI (Stormwate : Normal Operation : If level is less than	er) level in Riser Phase IV, stop	
	Sallon Tank at LTRF : Normal Operation. : If level is greater th : If level is less than	nan 11 feet, increase treatm 6 feet, decrease or stop ha	nent, hauling, or recirculation. uling/ recirculation.
Effluent Po 	Normal Operation. : If level is 6 inches of	or less, stop irrigation/ recir an 4 feet, increase irrigatio	culation/hauling n/ recirculation/hauling.
Observed re	unoff of effluent to storm	nwater basins? (Yes/No)	
	ntact supervisor immedia op spray irrigation immedi	itely. iately and provide the follow	wing information:
	Runoff TypeSevere	To BasinA	
	Moderate Minor	B C D	
·mments/R	Moderate	c	,
omments/R	Moderate Minor	c	
omments/R	Moderate Minor	c	

Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes : In compliance.  No :: Increase leachate removal required.  Contact supervisor immediately.  Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches (2.3 feet)?  Yes : In compliance.  No :: Increase leachate removal required.  Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater)  :: Normal Operation  :: If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF  :: Normal Operation.  :: If level is greater than 11 feet, increase treatment, hauling, or recirculation.  :: If level is less than 6 feet, decrease or stop hauling/ recirculation.	Date:	-10-95		_
Is Riser Phase IV below 27.6 inches (2.3 feet)? Yes : In compliance. No : Increase leachate removal required. Contact supervisor immediately.  Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes : In compliance. No : Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater) : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF : Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.  : If level is greater than 4 feet, increase irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Disserved runoff of effluent to stormwater basins? (Yes log)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	nspector: <u>M</u>	. Walken	Rainfall:	0.0
Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes A: In compliance. No: Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater): Normal Operation: If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF: Normal Operation: If level is greater than 11 feet, increase treatment, hauling, or recirculation: If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond: Normal Operation: If level is 6 inches or less, stop irrigation/ recirculation/hauling: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Disserved runoff of effluent to stormwater basins? (Yes Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	Is Riser Yes	: In compliance. : Increase leachate	removal required.	
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If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	: If	level is 6 inches or le	ess, stop irrigation/ red 4 feet, increase irrigat	circulation/hauling tion/ recirculation/hauling.
Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	Observed runoff o	f effluent to stormwa	ater basins? (Yes Nox	)
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omments/Remedial Action:	Run 	_ Severe _ Moderate	A B C	
	omments/Remedia	I Action:		
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Riser Phase IV	
Is Riser Phase IV below 2	7.6 inches (2.3 feet)?
Yes: In compliance.	
No: Increase leach:	ate removal required. visor immediately.
	visor minediatery.
Piezometer Phase IV	
Yes A: In compliance.	elow 27.6 inches (2.3 feet)?
No: Increase leach	ate removal required
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Sump No. 4 Phase VI (Stormwate	orl
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500,000 Gallon Tank at LTRF	
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Riser Phase IV  Is Riser Phase IV below 27.6 inches (2.3 feet)?  Yes : In compliance.  No :: Increase leachate removal required.  Contact supervisor immediately.  Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches (2.3 feet)?  Yes : In compliance.  No :: Increase leachate removal required.  Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater)  :: Normal Operation  :: If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF  :: Normal Operation.  :: If level is greater than 11 feet, increase treatment, hauling, or recirculation.  :: If level is less than 6 feet, decrease or stop hauling/ recirculation.	nspector: W. Matthews Rainfall: 0
Is Riser Phase IV below 27.6 inches (2.3 feet)? Yes : In compliance. No : Increase leachate removal required. Contact supervisor immediately.  Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes : In compliance. No : Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater) : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF : Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor  C D	
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Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes A: In compliance. No : Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater) : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF : Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Disserved runoff of effluent to stormwater basins? (Yes Disserved runoff of effluent to stormwater basins? (Yes Disserved runoff of effluent to stormwater basins? (Yes Disserved runoff Type To Basin Severe A Moderate B Minor C	Yes: In compliance.
Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes A: In compliance. No: Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater): Normal Operation: If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF: Normal Operation: If level is greater than 11 feet, increase treatment, hauling, or recirculation: If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond: Normal Operation: If level is 6 inches or less, stop irrigation/ recirculation/hauling: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes Observed runoff of effluent to stormwater basins? (Yes Observed runoff Type To Basin Severe A Moderate B Minor C D Minor D	
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Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater)	Yes N/4: In compliance.
Sump No. 4 Phase VI (Stormwater)	
Sump No. 4 Phase VI (Stormwater)	
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500,000 Gallon Tank at LTRF    Normal Operation.     If level is greater than 11 feet, increase treatment, hauling, or recirculation.     If level is less than 6 feet, decrease or stop hauling/ recirculation.     Normal Operation.     If level is 6 inches or less, stop irrigation/ recirculation/hauling     If level is greater than 4 feet, increase irrigation/ recirculation/hauling.     Observed runoff of effluent to stormwater basins? (Yes)   Yes: Contact supervisor immediately.     Stop spray irrigation immediately and provide the following information:     Runoff Type	
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Normal Operation.   If level is greater than 11 feet, increase treatment, hauling, or recirculation.   If level is less than 6 feet, decrease or stop hauling/ recirculation.	500,000 Gallon Tank at LTRF
: If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is less than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling : If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:    Runoff Type	
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: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type	Effluent Pond : Normal Operation.
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If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.
If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	Observed runoff of effluent to stormwater basins? (Yes (ND)
Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	•
Runoff Type       To Basin         Severe       A         Moderate       B         Minor       C         D	
Severe A	Stop spray irrigation immediately and provide the following information:
Severe A	Runoff Type To Rocio
Moderate B Minor C D	•
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omments/Remedial Action:	<del></del>
omments/Remedial Action:	
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nspector: M. Watthew	Rainfall: 0.6
Riser Phase IV  Is Riser Phase IV below 27.6 inche Yes: In compliance.  No: Increase leachate remov	val required.
Contact supervisor imm	еспатегу.
Piezometer Phase IV Is Piezometer Phase IV below 27.6 Yes Phr: In compliance. No: Increase leachate remov Contact supervisor imme	inches (2.3 feet)?
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If Yes: Contact supervisor immediately. Stop spray irrigation immediately and	provide the following information:
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nspector	In Mothers	 <b>^</b> Rainfall:	Ø
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Riser Ph	ase IV		
	Is Riser Phase IV below 27	'.6 inches (2.3 feet)?	
	Yes: In compliance.		
	No: Increase leacha	te removal required.	
<del></del>	Contact supervi	isor immediately.	
Piezome	ter Phase IV		9.1
	Is Piezometer Phase IV belo	ow 27 6 inches 12 3 feet)?	
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Suma N	4 Phase VII 15:	<u> </u>	<u> </u>
South 140	o. 4 Phase VI (Stormwater	)	•
	: Normal Operation		•
·	: If level is less than le	evel in Riser Phase IV, stop	pumping to Basin D.
500,000	Gallon Tank at LTRF		-
		in 11 feet increase treatme	ent, hauling, or recirculation.
	: If level is less than 6	feet, decrease or stop hau	ding/registration
		year, accidate or atch tigo	ing/ recirculation.
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Effluent l	_		
Effluent I	: Normal Operation.		
Effluent i	Normal Operation. : If level is 6 inches or	r less, stop irrigation/ recirc	ulation/hauling
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Observed	Normal Operation. : If level is 6 inches or : If level is greater tha  runoff of effluent to storms  Contact supervisor immediate	r less, stop irrigation/ recircon 4 feet, increase irrigation water basins? (Yes No)	/ recirculation/hauling.
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spector:	M.	Wallh	Rive	Rainfall:		0	
	Is Riser Ph	pase IV below In complianc Increase lead Contact supp	e.	required.			
San San San San	Yes MAN	eter Phase IV In complianc Increase lead Contact supe	below 27.6 in e. chate removal ervisor immed inter)	required.			
Effluent P	: If le :: I	mal Operation vel is greater vel is less tha mal Operation vel is 6 inches	than 11 feet, in 6 feet, deci n. s or less, stop	increase treatm rease or stop had pirrigation/ recirc	uling/ recircul	lation.	tion.
If Yes: Ci	runoff of e contact sup top spray i Runof	effluent to sto	ormwater basion diately. ediately and p	rovide the follow		``	
omments/	Remedial A	Action:		_ D			

Riser Phase IV  Is Riser Phase IV below 27.6 inches [2.3 feet]?  Yes: In compliance.  No: Increase leachate removal required. Contact supervisor immediately.  Piezometer Phase IV  Is Piezometer Phase IV below 27.6 inches [2.3 feet]?  Yes: In compliance.  No: Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater) : Normal Operation : If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF : Normal Operation. : If level is greater than 11 feet, increase treatment, hauling, or recirculation. : If level is greater than 6 feet, decrease or stop hauling/ recirculation.  Effluent Pond : Normal Operation. : If level is 6 inches or less, stop irrigation/ recirculation/hauling: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Disserved runoff of effluent to stormwater basins? (Yes No)  If Yes: Contact supervisor immediately.  Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D  Demments/Remedial Action:	Date: nspector:	N. Walltone	– _ Rainfall:	0.0
Is Riser Phase IV below 27.6 inches (2.3 feet)? Yes : In compliance. No :: Increase leachate removal required. Contact supervisor immediately.  Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes **M**: In compliance. No :: Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater)			_ naintail:	
Piezometer Phase IV Is Piezometer Phase IV below 27.6 inches (2.3 feet)? Yes Marchine In compliance. No: Increase leachate removal required. Contact supervisor immediately.  Sump No. 4 Phase VI (Stormwater): Normal Operation: If level is less than level in Riser Phase IV, stop pumping to Basin D.  500,000 Gallon Tank at LTRF: Normal Operation: If level is greater than 11 feet, increase treatment, hauling, or recirculation: If level is less than 6 feet, decrease or stop hauling/ recirculation: If level is 6 inches or less, stop irrigation/ recirculation/hauling: If level is greater than 4 feet, increase irrigation/ recirculation/hauling: If level is greater than 4 feet, increase irrigation/ recirculation/hauling: If level is greater than 4 feet, increase irrigation/ recirculation/hauling.  Observed runoff of effluent to stormwater basins? (Yes No)  If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	1.	s Riser Phase IV below 27.6 in Yes: In compliance. No: Increase leachate rei	moval required.	
Is Piezometer Phase IV below 27.6 inches (2.3 feet)?   Yes   Metallian   Yes   Metallian   Yes   Metallian   Yes   Metallian   Yes   Metallian   Yes   Yes   Metallian   Yes			mmediately.	# i
Sump No. 4 Phase VI (Stormwater)    Normal Operation	) } 	s Piezometer Phase IV below 2 Yes <u>NA:</u> : In compliance. No: Increase leachate rer	moval required. mmediately.	rangan sa sa sa sa sa sa sa sa sa sa sa sa sa
Normal Operation.   If level is greater than 11 feet, increase treatment, hauling, or recirculation.   If level is less than 6 feet, decrease or stop hauling/ recirculation.	Sump No.	: Normal Operation		
Normal Operation. If level is 6 inches or less, stop irrigation/ recirculation/hauling If level is greater than 4 feet, increase irrigation/ recirculation/hauling. Observed runoff of effluent to stormwater basins? (Yestivo) If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information: Runoff Type To Basin Severe Moderate Moderate B Minor C D		: Normal Operation. : If level is greater than 11		
If Yes: Contact supervisor immediately. Stop spray irrigation immediately and provide the following information:  Runoff Type Severe Moderate Minor C D	Effluent Po - -	<ul><li>: Normal Operation.</li><li>: If level is 6 inches or less</li></ul>	, stop irrigation/ recir	culation/hauling
Stop spray irrigation immediately and provide the following information:  Runoff Type To Basin Severe A Moderate B Minor C D	Observed r	unoff of effluent to stormwate	r basins? (Yes(No)	
Severe A Moderate B Minor C D			and provide the follow	·, wing information:
mments/Remedial Action:		Severe Moderate	A B C	
	omments/R	Remedial Action:		
	<u> </u>			· · · · · · · · · · · · · · · · · · ·

ate:	<u>J-1-9</u>	7			
nspector:	M. Walk		Rainfall:	0.0	2
Riser Phase Is	IV Riser Phase IV below	27.6 inches (2.3	feet)?		······································
	s <u>      :</u> In compliand				
No	: Increase lea	chate removal req	uired.		
	Contact sup	ervisor immediate	ly.		
Piezometer I	Phase IV			9.1	
	Piezometer Phase IV	below 27.6 inche	s (2.3 feet)?		
Υe	es <u>v/A</u> : In compliand	e.	. (2.0 .001,		
No	: Increase lead	chate removal req	uired.	•	
		ervisor immediate			
		:	•		
Sump No. 4	Phase VI (Stormwa	<del></del>		<del></del>	
	: Normal Operation				
· <u></u> -	: If level is less that		hasa IV stan	numning to Pa	in D
	<del></del>	all level ill Misel Fi	Tiase IV, Stop	pumping to bas	in <i>D</i> .
500,000 Ga	llon Tank at LTRF				
,	Alaman O	<b>~</b>			
	: Normal Operation	11.			
			rease treatme	nt, hauling, or	recirculation.
	: If level is greater : If level is less that	than 11 feet, inc			
Effluent Pon	: If level is greater : If level is less that	than 11 feet, inc an 6 feet, decreas n. es or less, stop irri	e or stop hau	ling/ recirculation	on.
Effluent Pon	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche	than 11 feet, inc an 6 feet, decreas n. es or less, stop irri than 4 feet, incre	gation/ recirculate irrigation/	ling/ recirculation	on.
Effluent Pon	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater	than 11 feet, inc an 6 feet, decreas n. es or less, stop irri than 4 feet, incre	gation/ recirculate irrigation/	ling/ recirculation	on.
Effluent Pon  Observed rui	: If level is greater :: If level is less that d :: Normal Operation :: If level is 6 inche :: If level is greater noff of effluent to state tact supervisor imme	than 11 feet, inc an 6 feet, decreas n. es or less, stop irri than 4 feet, incre ormwater basins?	gation/ recirculates irrigation	ling/ recirculation/hauling/recirculation/h	auling.
Effluent Pon  Observed rul	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater	than 11 feet, inc an 6 feet, decreas n. es or less, stop irri than 4 feet, incre ormwater basins?	gation/ recirculates irrigation	ling/ recirculation/hauling/recirculation/h	auling.
Effluent Pon  Observed rui	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imme	than 11 feet, income 6 feet, decreasen.  es or less, stop irrithan 4 feet, increpromwater basins?  diately.  diately and provi	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Effluent Pon  Observed rul	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imme Runoff Type	than 11 feet, inc an 6 feet, decreas n. es or less, stop irri than 4 feet, incre ormwater basins?	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Effluent Pon  Observed rui	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imme Runoff Type Severe	than 11 feet, income feet, decreased.  The sor less, stop irritation of the feet, incressed fe	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Dbserved rul	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imm  Runoff Type Severe Moderate	than 11 feet, income 6 feet, decreasen.  es or less, stop irrithan 4 feet, increpromwater basins?  diately.  diately and provi	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Effluent Pon  Observed rul	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imme Runoff Type Severe	than 11 feet, income feet, decreased in the feet, decreased in the feet, increased in the f	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Dbserved rul	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imm  Runoff Type Severe Moderate	than 11 feet, income feet, decreased.  The sor less, stop irritation of the feet, incressed fe	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Observed run	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imm  Runoff Type Severe Moderate Minor	than 11 feet, income feet, decreased in the feet, decreased in the feet, increased in the f	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Observed run	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imm  Runoff Type Severe Moderate	than 11 feet, income feet, decreased in the feet, decreased in the feet, increased in the f	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Observed run	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imm  Runoff Type Severe Moderate Minor	than 11 feet, income feet, decreased in the feet, decreased in the feet, increased in the f	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Observed run	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imm  Runoff Type Severe Moderate Minor	than 11 feet, income feet, decreased in the feet, decreased in the feet, increased in the f	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Effluent Pon  Observed rui  If Yes: Con Stop	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imm  Runoff Type Severe Moderate Minor	than 11 feet, income feet, decreased in the feet, decreased in the feet, increased in the f	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.
Effluent Pon  Observed rui  If Yes: Con Stop	: If level is greater : If level is less that d : Normal Operation : If level is 6 inche : If level is greater noff of effluent to sto tact supervisor imme o spray irrigation imm  Runoff Type Severe Moderate Minor	than 11 feet, income feet, decreased in the feet, decreased in the feet, increased in the f	gation/ recirculate irrigation/	ling/ recirculation/hauling/recirculation/h	auling.

#### EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

#### (Month/Year) MA4-1995

	Depth in Effluent	Leachate	Treated Effluent	Treated Eff	uent Hauled	Treated Effluent	Treated Effluent	Time at	(1) Effluent Runoff to	
	Pond	Treated	Sprayed	Contractor	County	Recirculation	Stored	End of	Retention	
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	Rainfall	Area (Y/N)	Initials
1	22	52,104	48,600	24,800			3804			
2	18	40,190	48,600	12,400						· · · ·
3	23	44,243	48,600	24.800				·		
4	24	35,584	48,660	18,661	_					
5	29	46,207	48,610	24.800				PM		
6	18	44,174		18,448			44.174			
7		39,940					39,940			
8	35	46,530	48,600	24,800						
	32	44,537	39,600	18.600			4937			
10	29	44,578	39,600	24,853	·		4,978			
11	29	19,898	39,600	30,944						
12	20	45,385	39,600	31,060			5.785			
13	L	48,750	_				48,750			
14		42,840					42,840			
15	32	45 961	48.600	24.787						
16	28	44,213	48,600	18,714	-					

Comments:	

#### EFFLUENT DEPTH/QUANTITIES DATA FORM SOUTHEAST COUNTY LANDFILL

(Month/Ye	ar)	

	Depth in		Treated			Treated	Treated		(1) Effluent	•
	Effluent	Leachate	Effluent	Treated Efflu	ent Hauled	Effluent	Effluent	Time at	Runoff to	
	Pond	Treated	Sprayed	Contractor	County	Recirculation	Stored	End of	Retention	
Date	(inches)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	Rainfall	Area (Y/N)	Initials
17	26	45,480	48,600	24,847	· <del>-</del> · .					
18	22	45,470	37 600	30,966						
19	15	17 622	37,600	37,417			7,870			
20	16	45,780					48,780			
21	20	45,030					45,030			
22	38	23,810	37,600	24,655			,			
23	33	45,910	48,600	18,623	·					
X 24	29	292	48,600	24862						
25	26	45,154	48,600	37,968	······································					
ි 26.	18	45, 154	48,600	62,614						
¥ 27	10	5, 273					5,273			
28		44,614			·,,		44.614			
29	26	45, 232		37,184			45,232			· · · · · · · · · · · · · · · · · · ·
<b>X</b> 30	24-	1255	48,600	31:041						
31	19	45,030	48,600	24.845						

(1) If yes: Conta	ct Supervisor imme	diately and stop	spray irrig	ation. Complete	Evaluation Repo	ort Form.				
Comments:	Power	ofs -	X	Power	off-		 	 	 	
				ï			 			
				•				•		
				1			 			

Date:	ک	101	/95	
	7	,	,	

Time: 0700

Leachate Treated	d (gallons)			52/0
Treated Effluent	t Stored (gal	lons)		3504
Treated Effluent	Sprayed (ga	llons)		48600
Comments:	-1			
		<u> </u>		

Date: 5/02/45	Time:	0700
Leachate Treated (gallons)		40 190
Treated Effluent Stored (gallons)		0
Treated Effluent Sprayed (gallons)		48600
Comments:		
	•	

Operator Signature: William S. Homblower 8015B

Date:	5-	05-	9	5

Time: 0700

Leachate Treated (gallons)	4424
Treated Effluent Stored (gallons)	-6-
Treated Effluent Sprayed (gallons)	48600
omments:	
<u> </u>	

Date: 194,95

Time: 07:00 hs

Leachate Treated (gallons)	35584
Treated Effluent Stored (gallons)	0
Treated Effluent Sprayed (gallons)	48660
Comments: Totaly - Reading Sprax Field	
Operator Signature: William S. Homblower 80/5B	,

Date: May 05 95.

Leachate Treated (gallons)

Treated Effluent Stored (gallons)

Treated Effluent Sprayed (gallons)

Comments: Totalizer Reading Spray Field

Operator Signature: William S. Homblower 8015B

Date: 5-06-95	Time:	0700	<u>υ</u>	
Leachate Treated (gallons)		4417	4	
Treated Effluent Stored (gallons)		4417	4	
Treated Effluent Sprayed (gallons)		40	ナ	
Comments:				
	·			

Operator Signature: William S. Homblower 8015B

Time:	0700 hr

Leachate T	reated (ga	llons)				39,	940
Treated Ef	fluent Sto	red (gall	ons)			39	940
Treated Ef	fluent Spr	ayed (gal	lons)			1	$\leftarrow$
Comments:							
			·				
					•		
Operator Sid	-natura.	4171	0 ; 1	11	S. FA		

Date: 3 - 38 - 73	Time:_	6-100	
Leachate Treated (gallons)	<del>- 1</del>	46 530	
Treated Effluent Stored (gallons)		-0	
Treated Effluent Sprayed (gallons)		48,600	
Comments:		<del></del>	

Operator Signature: William S. Homblown 8015B

Date: 5-09-95

Comments:

Leachate Treated (gallons)	44 537
Treated Effluent Stored (gallons)	4937
Treated Effluent Sprayed (gallons)	39600

	<u>:</u> ::	· · · · · · · · · · · · · · · · · · ·		
				· · · · · · · · · · · · · · · · · · ·
Operator Signature:	William &	16.11.	DOICE	

Date: 5-10-95	Time:_	0700	
Leachate Treated (gallons)			44070
Treated Effluent Stored (gallons)			4,978
Treated Effluent Sprayed (gallons)			39600
Comments:			

_		. 1 .	0 1 11		
Operator	Signature:_	William	& Hornblower	80158	

Date: 5-11-95	Time:	0700
•	<del></del>	

		·	 	······································
			•	
Comments:			 ·	
				<u></u>
Treated Effluent Sp	rayed (gall	ons)		39600
Treated Effluent St	ored (gallo	ns)		
Leachate Treated (g	allons)		 	19898

Operator Signature: William S. Honblower 8015B

Date: 3-12-95	Time: 0	700
Leachate Treated (gallons)		X5 385
Treated Effluent Stored (gallons)		5,785
Treated Effluent Sprayed (gallons)		39600
Comments:		
	· · · · · · · · · · · · · · · · · · ·	
Operator Signature: William S. Hombs	lower 8015B	

Date:	5-13	3-95	
-			

Leachate Treated (gallons)	48 750
Treated Effluent Stored (gallons)	48750
Treated Effluent Sprayed (gallons)	-0

- Outrica .		
Derator Signature:	William S. Hornblower 8015B	
peracor bighacure.	William 1. Homblower 30/50	

Date: 5 - 14 - 95
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Leachate Treated (gallons)	42840
Treated Effluent Stored (gallons)	42840
Treated Effluent Sprayed (gallons)	6
Comments:	
	——————————————————————————————————————

DATE: 5/5:- 75	TIME:	800
Leachate Treated (gallons)		45961
Treated Effluent Stored (gallons)		0
Treated Effluent Sprayed (gallons)		48,600
<pre>Pump Capacity 300 gal/min x minutes run = gal sprayed Comments:</pre>	§ =	x
Operator Signature: (1/10/12)	Hora along	801CB

DATE: 5, -16- 75	TIME:	0800
Leachate Treated (gallons)  Treated Effluent Stored (gallons)  Treated Effluent Sprayed (gallons)		44213
<pre>Pump Capacity 300 gal/min x minutes run = gal sprayed Comments:</pre>	§ =	x
Operator Signature: William &	16. 11	

Leachate Treated (gallons)		45.480
Treated Effluent Stored (gallons)		-0-
Treated Effluent Sprayed (gallons)		48,600
Pump Capacity 300 gal/min x minutes run = gal spraye Comments:	% =	x

ياجيد ديد مرس والهويسيم مصميني واباعه المينيسين الماسات	45 470
ous)	7870
	37.600
	in an an an an an an an an an an an an an
in S. Homblowe	2 8015B
	lons)  * =  Prayed

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F.

Leachate Treated (gal	llons)		17%	22 -
Treated Effluent Stor	The state of the s	· · · · · · · · · · · · · · · · · · ·	0	
Treated Effluent Spra		·	37	600
minutes run =	er Poset	ill D.	alen of	./
Comments: TotaLig	er Reset u	i.th Po	wer fa	ilune
Operator Signature:	er Reset u Wielsin S. Ho			ilune
Comments: TotaLig	er Reset u			ilune

.

Treated Effluent Stored (gallons)  Treated Effluent Sprayed (gallons)  Pump Capacity 300 gal/min x	45 780
Pump Capacity 300 gal/min x % =	
Pump Capacity 300 gal/min x	
Comments:	x
Operator Signature: William S. Homblower	8015B

120000	d (gallons)		4503	(7)
	t Stored (gallons)	····	4503	? <i>(</i> )
	Sprayed (gallons)		-0	<u> </u>
Pump Capacity 300	gal/min x	% =	X	
Comments:	gal spraye	d		
Conditiones:				<del></del>
			· · · · · · · · · · · · · · · · · · ·	
			·	<del></del>
Operator Signatur	e: William S.	Tomblower of	8015B	· ·
	·			
				. •

Leachate Treated (gallons)	23 810
Treated Effluent Stored (gallons)	-0-
Treated Effluent Sprayed (gallons)	37,600
Pump Capacity 300 gal/min x	th power failur

Date: 5-23-95	Time:	0800
Leachate Treated (gallons)		45.910
Treated Effluent Stored (gallons)		-0-
Treated Effluent Sprayed (gallons)		48.600
Comments:		
	- <del></del> -	

Operator Signature: William S. Hornblown 8015B

Date:	5-	24-	95	

Leachate Treated (gallons)	292
Treated Effluent Stored (gallons)	
Treated Effluent Sprayed (gallons)	48600
omments: Powerfailure Totalizer Roll Not true Reading	back Numbers

Date:	5-25	-95

Comments:

Time: 0800

Leachate Treated (gallons)	45,154
Treated Effluent Stored (gallons)	-0
Treated Effluent Sprayed (gallons)	48600

				-
. 1 .	n	. (	 	

Operator Signature: William S. Homblower 8015B

Date: <u>3 - 26 - 95</u>	Time:	0800	
Leachate Treated (gallons)		45.154	
Treated Effluent Stored (gallons)		-0	
Treated Effluent Sprayed (gallons)		48600	

	•			
	<del>· · · · · · · · · · · · · · · · · · · </del>			
Operator Signature:	1.1:00:	l 11 = 11 .	On , Ca	

Comments:\_

	Date:	_ 5	-27-	95	
--	-------	-----	------	----	--

Comments:

Time:	0800	
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Leachate Treated (gallons)	5273
Treated Effluent Stored (gallons)	5273
Treated Effluent Sprayed (gallons)	. 0

•			
Operator Signature.	1300	0 // 1/1	

Operator Signature: William S. Homblown 8015B

Date: $5 - 28 - 95$	Time:	0800
Leachate Treated (gallons)		44614
Treated Effluent Stored (gallons)		44614
Treated Effluent Sprayed (gallons)		10
Comments:	·	
Operator Signature: William J.	Homblowe	n 8015B

Date: 5 - 29 - 95	Time:_	0800	
Leachate Treated (gallons)			45232
Treated Effluent Stored (gallons)			45232
Treated Effluent Sprayed (gallons)			-0
Comments:			
Operator Signature: William S. Hom	blower	8015B	

Date: 5 - 30 - 93	Time:	080	0	_
Leachate Treated (gallons)			-1255	17-
Treated Effluent Stored (gallons)				
Treated Effluent Sprayed (gallons)			48600	
Comments: Power failure Totalize	R Roll	back		
				,
				•
Operator Signature: William & Hor	nblower	8015	3	

Date:	5~	3/	-95	

Leachate Treated (gallons)	45030
Treated Effluent Stored (gallons)	-0-
Treated Effluent Sprayed (gallons)	48600
Comments:	
Operator Signature: William S. Homblower 8015	B