AIRPORT FUEL FARM ISSUES

10/26/01

#R15-1

Council Agenda Item: #R15

SUMMARY:

Council acceptance and approval of the final report of the Fuel Farm Committee related to the site relocation and operating methodology of the Addison Airport Fuel Farm.

FINANCIAL IMPACT:

Budgeted Amount: N/A

Cost:

BACKGROUND:

Earlier this year, City Council officially created and charged a special advisory committee with the work of researching, analyzing and recommending a preferred site for the new fuel farm and the methodology of its operation. Fuel Farm rates and charges were not part of this process and will be determined and brought forward to Council at a later date. The committee facilitated by Addison Airport Director, Dave Pearce has concluded their work and has provided their attached recommendation. There is a consensus between the committee, airport operator and staff as to the selection of the primary (Northeast end of the Airport adjacent to the Service Center) site and secondary site (East tie-down area between the Airport Admin. Offices and the Police Facility) as well as the methodology for the operation of the fuel farm (Town owns and leases tanks). The committee's recommendation also includes other criteria that they are recommending be included as well, in addition to their concurrence of the two objectives.

Committee member, Laura Herrick, will appear before Council to report on the Committee's process and deliver their recommendation.

Attachments: Dave Pearce – Memorandum of Recommendation
Airport Site Map
Phase II Environmental Assessment Memo – WGI
Present Fuel Farm Site Map
Fuel Farm Advisory Committee - Process
Fuel Farm Advisory Committee Recommendation
Fuel Farm Advisory Committee – 10/19/01 Meeting Minutes
Fuel Farm Advisory Committee – Response to sections of the Phase I Environmental Assessment Update

RECOMMENDATION:

Staff recommends the approval of the recommendation as submitted by the operator and committee with the exception and exclusion of items A-2, 3,4,5,7,8 & D of the committee's recommendation.

MA

#R 15-2

Fax: 972.788.9334
4651 Airport Parkway
Addison, Texas 75001
Phone: 972.392.4855

Addison! Airport

Memo

To: Mark Acevedo, Administrator Facilities & Fleet Services

From: David C. Pearce, Airport Director

CC: Darci Neuzil, Assistant Airport Director
Bob Katzen, Real Estate Operations Manager

Date: 10/26/2001

Re: Fuel Farm Site Recommendation

Comments:

This memo is to provide a recommendation to design and construct a new fuel farm at the Addison Airport. The recommendation is based on a number of factors listed below. In order to provide a true understanding of the many issues surrounding this proposal, a background summary, council appointed committee recommendations, committee documents, and a copy of the initial committee briefing are provided for review.

To remain focused on the task, the Washington/Staubach recommendation will be in response to the task only which was to identify potential fuel farm site locations. Fuel farm rates and charges are not part of this recommendation and therefore will not be addressed.

Recommendation Washington/Staubach recommends approval of the primary and secondary sites depicted on the attached map. Additionally, it is recommended that the fuel farm be designed and constructed by the Town and individual sites located at the central fuel farm be leased to the current active fuel farm users; Addison Express, Mercury Air, Million Air and Cherry Air. The primary and secondary sites both allow separation of airfield and 18-wheel vehicles, easy emergency response access, keeps 18 wheel refuelers off of main streets and are on currently owned airport land. The Fire Marshal has review both site to ensure they conform to all applicable codes.

Background Upon receiving the contract to manage the Addison Airport, an agreement was made to have an assessment of the environmental conditions at the Addison Airport. It would

be logical to assume that this was generated because an environmental condition baseline is needed to obtain the Pollution Liability Insurance for the fuel farm; a requirement outlined in the contract. None-the-less, the Town of Addison contracted with Camp Dresser and McKee (CDM) to accomplish a Phase I Environmental.

CDM performed a Phase I Environmental Update to their previous 1998 report. The Update indicated environmental deficiencies. The report indicated that records depicted petroleum spills subsequent to the State acknowledging site closure and that there is a history of fuel spills and releases throughout the fuel farm area. CDM recommended that the Town enter the voluntary cleanup program. During this time, subsequent inspections of the fuel farm were also made. It appears that fuel farm tanks have been abandoned without entering the closure process. Based on the CDM report and subsequent inspections, Washington/Staubach was unable to obtain Pollution Liability Insurance.

Based on the above, we recognized that a Phase II environmental is required. A Phase I Environmental is performed to assess and identify compliance with EPA regulatory guidance. It provides an overview of existing conditions but it does not go beyond that i.e. determining the extent of deficiencies. Therefore, the Phase I does not provide a baseline for transfer of property. Additionally, the only practical option would be to enter the voluntary cleanup program when performing the Phase II Environmental. With that said, we assessed the options.

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Performing a Phase II environmental and entering the voluntary cleanup program presents some unique challenges. Currently there are 29 underground storage tanks (USTs) of which 14 are in service. The 15 abandoned tanks will need to be removed as well as the some of the ground surrounding them. It is likely that there will be open holes for a period of time during the mitigation process. This is the point where we based our options.

Not necessarily so

Options It is likely that access to the existing fuel farm will be impacted during a cleanup process. To eliminate any impact the option of staging fuel trucks near but not adjacent the fuel farm during the construction period was assessed. The benefit of this is that fuel availability would not be impacted however, the potential for ground and storm water contamination is high as well as fire and safety concerns. We eliminated this option.

maybe

We contacted some other airports and engineering companies to obtain a general conscientious on what is the average service life on USTs. We found that one could plan to find leaks around the 17-25 year point. Reviews of the Addison tanks depict that all of the in use tanks are over 15 years with many of the abandoned tanks being well over the 25-year point. With that as a base line it appears that the decision was weather to clean up the existing fuel farm and continue it's use or look at constructing a new fuel farm, transitioning into the new fuel farm and then cleanup the existing fuel farm. We selected the later.

SP

SP

After review of the above information, it was decided that a committee would be formed to also research, analyze, and recommend a preferred site for the new fuel farm and a methodology for its operation to the City Council. Their report is enclosed.

Site Selection The fuel farm sites listed in the Barnard Dunkelberg & Company 1997 Master Plan was reviewed. The site at the corner of Westgrove and Addison road was not considered to be operationally assessable. The other site located on Addison Road was not on airport land and would have required airport fuel trucks to transient public roads. These two sites were not considered to be adequate.

Before preceding further a review of the operational aspects surrounding a fuel farm was made. First, it is desired to have a fuel farm located where airside vehicles will remain "airside" and the large refueling vehicles will not have access to the airport proper. Secondly and equally important is fire response time. Access for emergency vehicles must be considered. Additionally, street access pertaining to ingress and egress for the 18-wheel refuelers must be considered. In final, the access to airport refuelers from both a safety and operational standpoint must be reviewed. The above information was used to research and recommend a new fuel farm site.

Any site on the west side of the airport would require airfield refuelers to cross the runway so sites west of the runway were not considered. Two were that met the criteria above are recommended as first (primary) and second secondary) choice. A map depicting those is attached.

The first choice is south of the Service Center adjacent the storage yard. Preliminary discussions with TxDOT and FAA indicate that this site may be acceptable but due to the fact that it might penetrate the Part 77 approach surfaces a secondary site was identified.

The secondary site is located west of the police station on the aircraft tie-down area. This site also meets all the operational aspects addressed earlier in this memo. The secondary site does not encroach Part 77 surfaces or setback restrictions.

#R15-3

Addison Airport Fuel Farm Advisory Committee
Recommendation to City Council
November 13, 2001

Background and Current Situation

Jack Hopkins, GM of Million Air, Inc.

Discussion of fuel farm

- Number of tanks, in-use and abandoned
- Average life of tanks
- Current location
- Lack of contamination
- Condition of existing fuel farm

Reasons for relocating the fuel farm

- Long-range plans call for upgrading the airport facilities
- By moving the fuel farm, the land could be redeveloped into a more aesthetically pleasing purpose

Objectives and Recommendation

Laura Herrick, Addison Resident

Objectives

- Existing fuel farm operators do not wish to increase their operating costs (fuel flowage fees and ground leases).
- Most of the existing tanks have 10-20 years of useful life remaining, are in good operational condition, and the owners do not wish to lose their investment.
- If a new fuel farm can be built at the Town's expense and the operating costs are not increased, the fuel operators will agree to the relocation.

Recommendation

A. The committee recommends the following course of action for relocating the fuel farm:

1. The Town of Addison would build the new fuel farm at a recommended primary or secondary site (see B below).

2. Engineers hired to design the new fuel farm must have sign-off by current fuel tank owners/lessors before the design/plan is submitted to the Town for approval.

3. Current fuel tank owners/lessors may continue to use their existing tanks until the new tanks are operational.

4. Current fuel tank owners/lessors would allow the Town of Addison to remove and clean up the existing fuel farm at the Town's expense.

5. Town of Addison would bear the cost of removing/cleaning up abandoned tanks.

6. The Town of Addison would own the new fuel farm and lease tanks to fuel operators.

7. After the new fuel farm is in operation, the fuel flowage fee will be no higher than the current rate as of October 19, 2001

8. Lease rates for fuel tanks would remain at the level currently paid by Addison Express (or their successors) until the expiration of its current lease; for 20 years thereafter, lease rate increases will be tied to the current Addison Express rate plus CPI.

B. The committee recommends the following sites for the new fuel farm:

1. Primary site: Adjacent and South of the Service Center

2. Secondary site: Adjacent and West of the Police Station and existing tie-down area

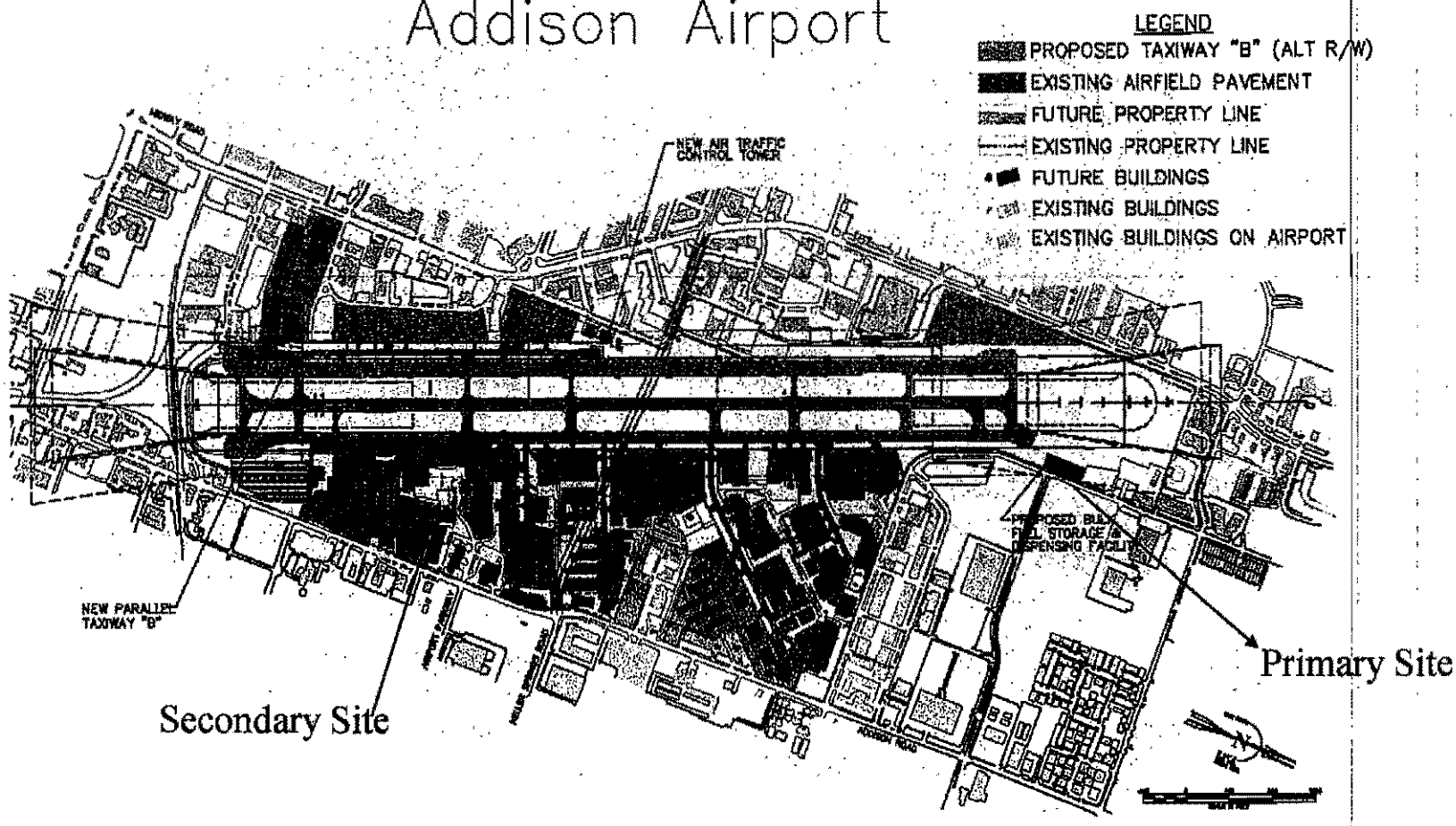
C. The final selection of a site is dependent on the following criteria:

1. The site preserves existing approach minimums.
2. The site does not impede future development or improvements to approach minimums.
3. The final site selection is subject to FAA approval.

D. The committee will remain intact until the new fuel farm is operational.

E. The committee appointed Jack Hopkins and Laura Herrick co-chairmen of the committee. Jack and Laura will present these recommendations to the City Council on November 13, 2001.

Addison Airport



Washington

AIRPORT DEVELOPMENT CONCEPT DRAWING

ADDISON AIRPORT
ADDISON, TEXAS

#R15-4

#R15-5

How about fuel containment after the

PHASE I ENVIRONMENTAL ASSESSMENT UPDATE RECOMMENDATIONS AND RESPONSES

According to page 6 of the Phase I Environmental Assessment Update prepared by Camp Dresser & McKee dated August 29, 2001, *"Based on TNRCC records which document a Compliance Evaluation Inspection (CEI) of each of the seven fuel farms on April 21, 1998, all USTs [Underground Storage Tanks] at the fuel farm are now in compliance."*

The report also references four leaking petroleum storage tank (LPST) sites at the airport's fuel farm. It is important to note that a LPST site is defined as "A site at which a confirmed release of a petroleum substance from an UST or AST has occurred. Petroleum substance contamination which results from multiple sources may be deemed as one LPST site by the agency."[i] Any significant, uncontrolled release of fuel from a tank is considered a LPST. The cases referenced by the Phase 1 are not actually leaking tanks, but rather the result of overfills or spills. No evidence of problems with the individual tanks has been presented or found.

Following is a list of the recommendations contained in Section 7.2.1. In ***bold*** after each recommendation is the necessary action that has been or should be taken:

- *Registration Inconsistencies*

  CDM recommends amended tank registration forms be submitted by Addison Airport (Multi-User Fuel Farm), Cherry Air, Million Air, Mercury Air, and Addison Express to accurately reflect the status, contents, and/or capacity of their respective tanks. The Town should monitor this activity to ensure that it is completed correctly. ***Five tanks being used by Addison Express are registered to both Addison Express and R Stern FBO Fuel Farm, three tanks being leased from the town by Mercury Air Center are registered to both the lessee and the lessor, and one tank is registered to Monarch although they do not have a tank. This recommendation can be easily followed by updating paperwork at the Airport Operator's / Town's convenience***[ii]

- *Regulatory Issues*
  - Based on the absence of TNRCC notification documentation for the releases at the Addison Express fuel farm, further investigation should be performed to verify the releases were reported as required. ***According to information and documentation pending from by General Manager Ed Morales these releases have been reported as required.***[iii]
  - The removable gates on the spill pads located adjacent to the Multi-User Fuel Farm and Million Air fuel farm should be replaced as

soon as possible to prevent future spills on the pad from coming in contact with adjacent soil. ***The gates are outside the individual fuel farm fences and therefore the Airport Operator's / Town's responsibility. They should be simple and inexpensive to replace.***

- Texas Pro Air Fuel Farm – if not already done, plug and abandon the associated monitoring well and submit a Final Site Closure Report. ***In a letter from EA Engineering dated April 17, 2001 to David Pearce[iv], the Airport Operator was notified of the need to plug and abandon these wells. This farm is the responsibility of the Airport Operator / Town. According to the TNRCC database, this case is still open.[v]***
- Million Air Fuel Farm – obtain a letter from the TNRCC approving Million Air not to plug and abandon the monitoring wells installed as part of their release investigation. ***Million Air has requested these remain open and has not yet received approval. This is a matter of paperwork and should be easily resolved. According to the TNRCC database this case has been closed.[vi]***
- Jet Way Fuel Farm (formerly R. Stern Fuel Farm) – determine the reason TNRCC issued a letter approving closure of the LRST case and then subsequently issued another letter stating further corrective action may be necessary. If further corrective action is necessary, the additional activities should be completed and reported. ***The last correspondence received by R Stern documents the closure of this case.[vii] According to the TNRCC database, this case has been closed.[viii]***
- AATI Fuel Farm (Multi-User Fuel Farm) – if not already performed, the activities requested in the TNRCC's CARF dated April 6, 1999 should be completed and reported, and a Release Report Form should be submitted to document the removal of the two 1,000-gallon tanks. ***This is a paperwork issue and the responsibility of the Airport Operator / Town of Addison.***
- Cherry Air Fuel Farm (Addison Aircraft Storage Fuel Farm) – if not already performed, a risk-based assessment should be completed and reported to the TNRCC in an Assessment Report Form. ***According to the TNRCC database, this LPST case has been closed.[ix] The site assessment has been completed and forwarded to TNRCC.[x]***

- *Release Investigation*

Information obtained from Addison Express indicates that no sampling has or will be performed in response to releases at their fuel farm. CDM recommends these releases, as well as any others occurring in the future, should be characterized through a combination of surface, subsurface and/or groundwater sampling and testing to establish baseline soil and groundwater conditions. ***According to information and documentation***

supplied by General Manager Ed Morales sampling has been accomplished in accordance with TNRCC guidelines.[xi]

Also at issue regarding the Fuel Farm is the question of insurability. All of the current fuel farm operators have liability insurance at this time.[xii] The fuel farm operators' insurance is the primary coverage in the event of a covered event. Any difficulty obtaining insurance coverage is unique to the Airport Operator / Town of Addison.

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[i] (Texas Administrative Code, Title 30 Environmental Quality, Part I Texas NATURAL RESOURCE CONSERVATION COMMISSION, Chapter 334 UNDERGROUND AND ABOVEGROUND STORAGE TANKS, Subchapter A GENERAL PROVISIONS, RULE §334.2 Definitions)
[ii] See Exhibit A: Notices of Storage Tank Registration
[iii] See Exhibit B: Documentation from Garner Environmental and Cactus Environmental
[iv] See Exhibit C: Letter from EA Engineering
[v] See Exhibit D: TNRCC Database Query Results for LPST ID # 91471
[vi] See Exhibit E: TNRCC Database Query Results for LPST ID # 98890
[vii] See Exhibit F: Letter from TNRCC to Ray Stem
[viii] See Exhibit G: TNRCC Database Query Results for LPST ID # 110033
[ix] See Exhibit H: TNRCC Database Query Results for LPST ID # 112934
[x] See Exhibit I: Site Assessment Executive Summary for LPST ID # 112934
[xi] See Exhibit B: Documentation from Garner Environmental and Cactus Environmental
[xii] See Exhibit J: Insurance Documents from Fuel Farm Operators

Washington
Industrial/Process

October 15, 2001

Mr. David Pearce
Washington Staubach
Addison Airport
4651 Airport Parkway
Addison, Texas 75001

Re: **Phase II Environmental Site Assessment**
Addison Airport Fuel Farm

Dear Mr. Pearce:

This letter reaffirms our position for the importance of conducting the field investigation at the airport fuel farm, as presented in our proposal, and accepted by the Town of Addison on August 15, 2001. The following items are indications that further investigation needs to be conducted in the vicinity of the existing fuel farm:

1. Records indicate spills of petroleum products have occurred without the necessary and required documentation on site. These have been known to occur subsequent to the State of Texas acknowledging the site had met closure requirements.
2. Fuel tanks have been abandoned without entering the closure process.
3. Identified tank locations not previously documented in the Phase I report.
4. History of spills and releases throughout the tank farm area.
5. Contractual obligation for baseline conditions to be established as part of Washington Staubach assuming airport operations.

We believe that any and all of these items warrant establishing an understanding of current subsurface conditions for the potential contamination from petroleum hydrocarbons. If you have any questions regarding this project, please call me at 281.529.8939.

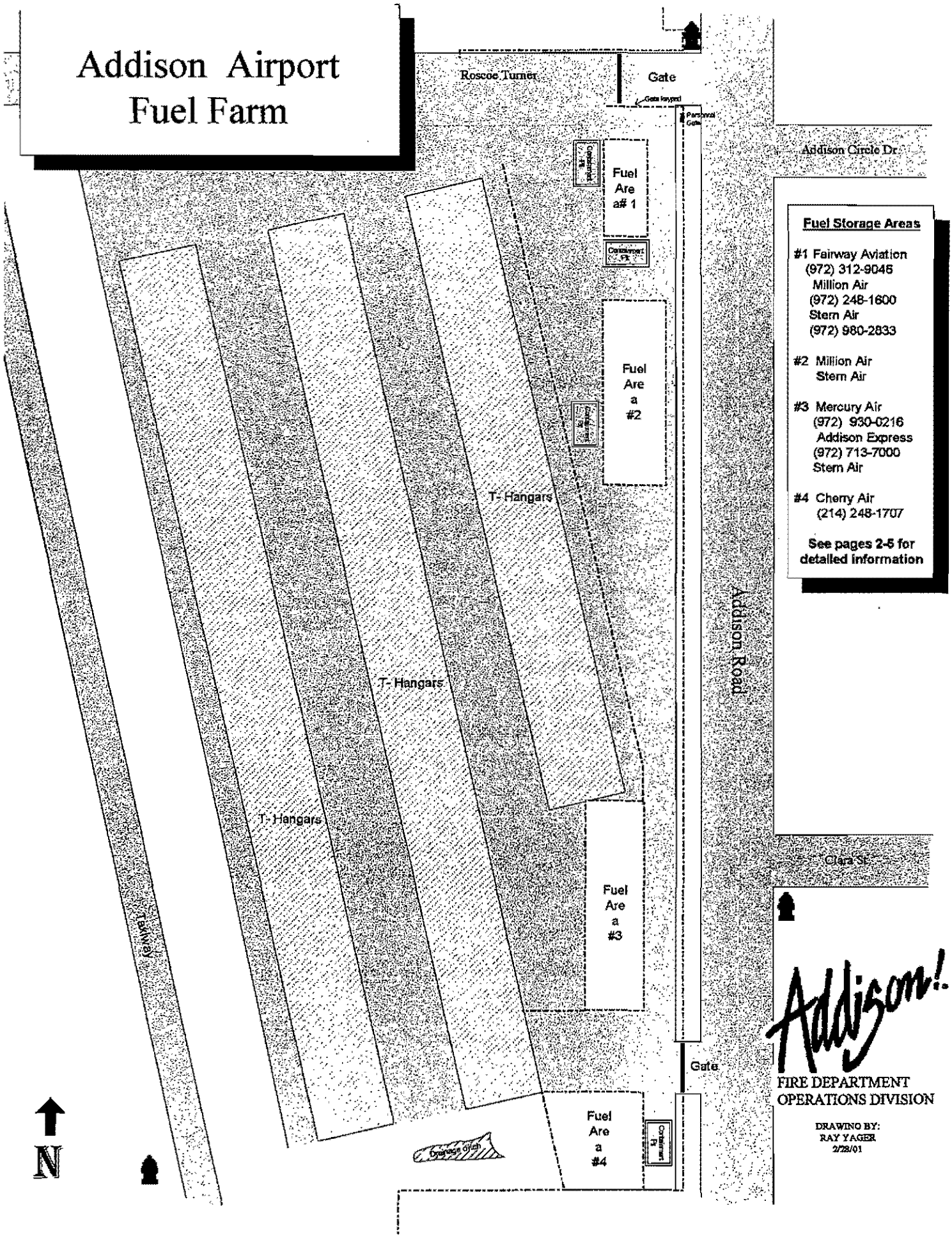
Sincerely,
WASHINGTON GROUP INTERNATIONAL, INC.

Paul R. Wild

Paul R. Wild
Manager of Environmental Services
TNRCC Registered CAPM #00385

#R15-6

Addison Airport Fuel Farm



Fuel Storage Areas

#1 Fairway Aviation
(972) 312-9046
Million Air
(972) 248-1600
Stern Air
(972) 980-2833

#2 Million Air
Stern Air

#3 Mercury Air
(972) 930-0216
Addison Express
(972) 713-7000
Stern Air

#4 Cherry Air
(214) 248-1707

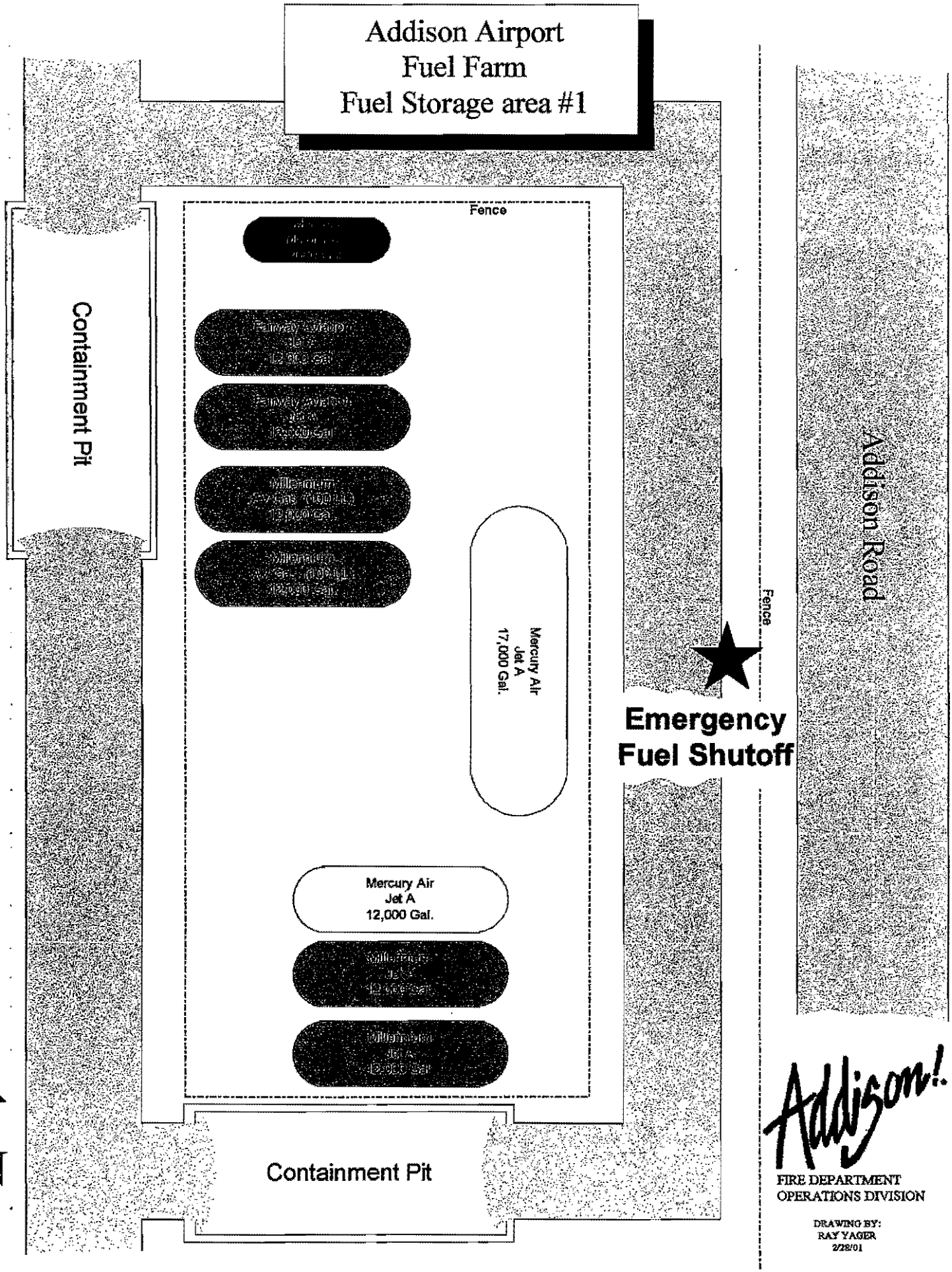
See pages 2-5 for detailed information

Addison!

FIRE DEPARTMENT
OPERATIONS DIVISION

DRAWING BY:
RAY YAGER
2/28/01

Addison Airport
Fuel Farm
Fuel Storage area #1

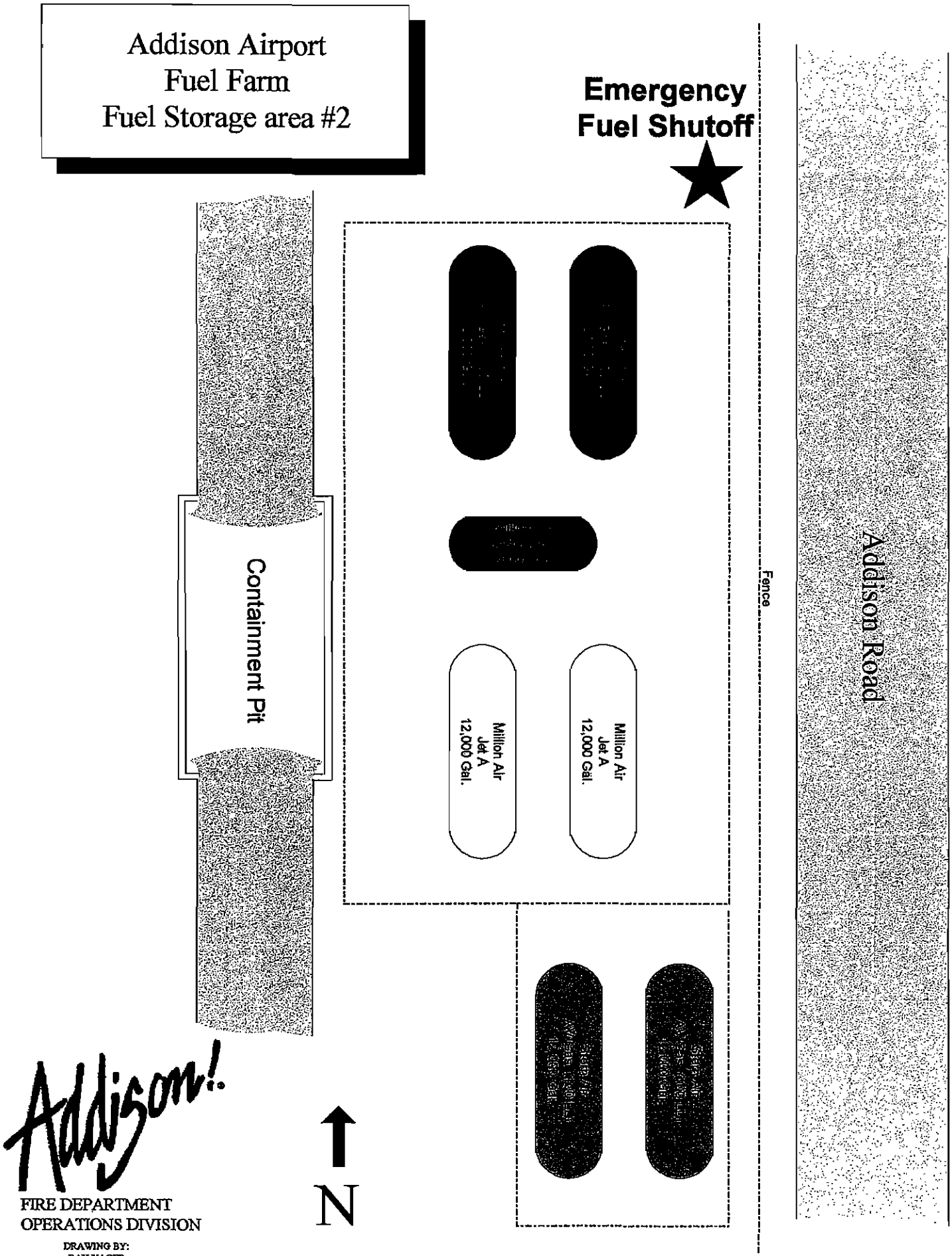


Addison!

FIRE DEPARTMENT
OPERATIONS DIVISION

DRAWING BY:
RAY YAGER
2/28/01

Addison Airport
Fuel Farm
Fuel Storage area #2



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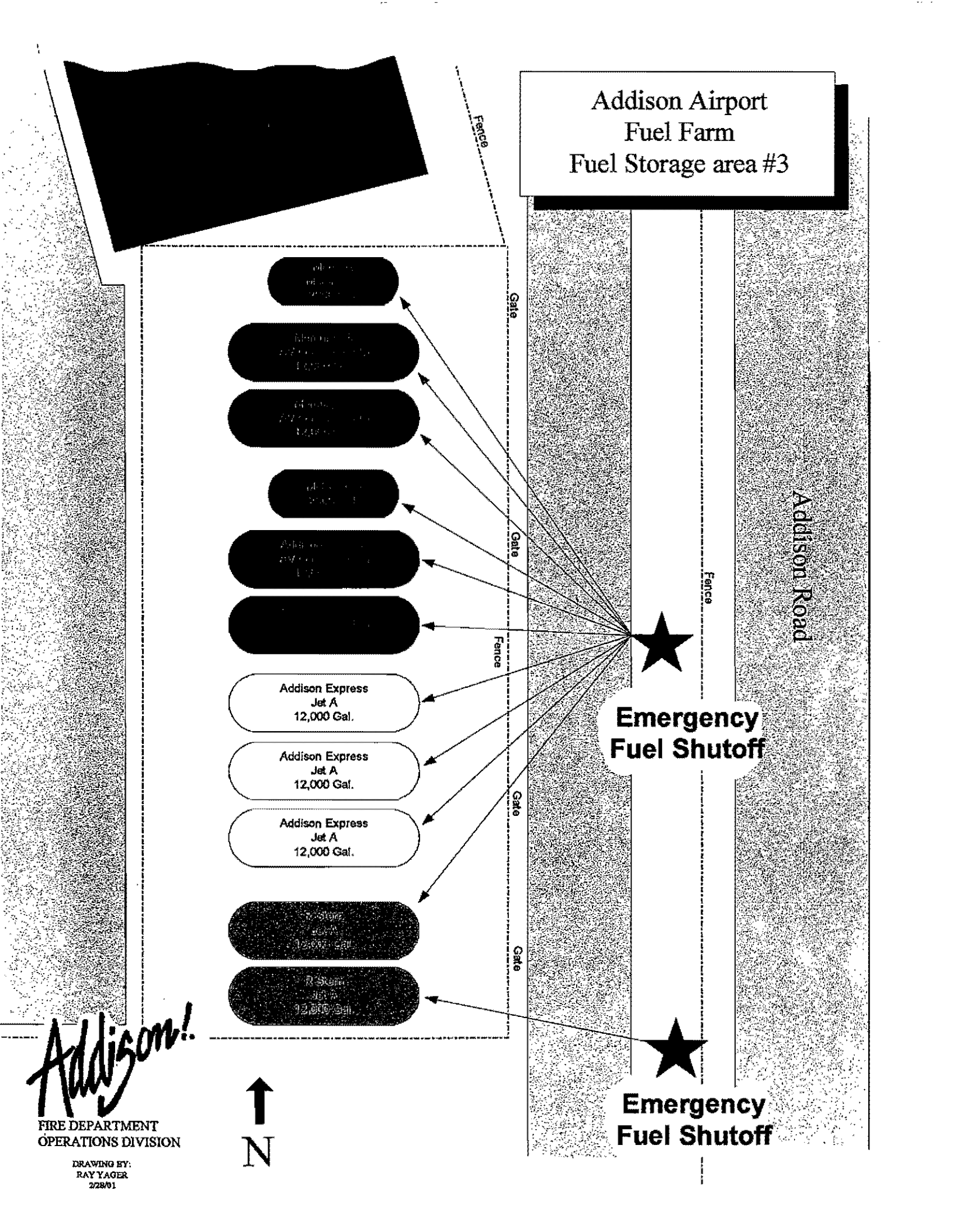
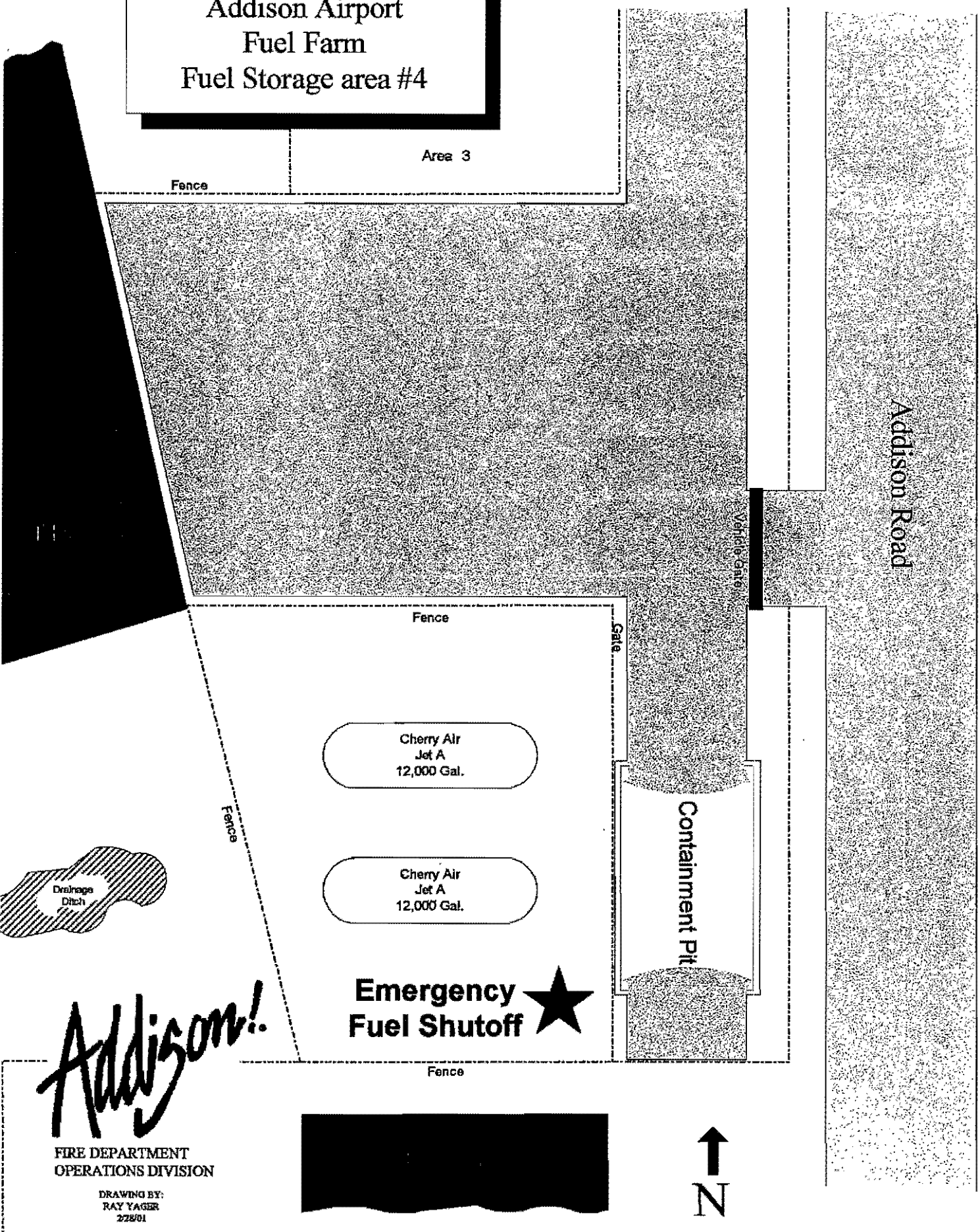

Addison Airport
Fuel Farm
Fuel Storage area #3
Fence
Gate
Gate
Fence
Fence
Gate
Gate
Addison Road
Addison Express
Jet A
12,000 Gal.
Addison Express
Jet A
12,000 Gal.
Addison Express
Jet A
12,000 Gal.
Emergency
Fuel Shutoff
Emergency
Fuel Shutoff
N
Addison!
FIRE DEPARTMENT
OPERATIONS DIVISION
DRAWING BY:
RAY YAGER
2/28/01

Addison Airport
Fuel Farm
Fuel Storage area #4



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FIRE DEPARTMENT
OPERATIONS DIVISION

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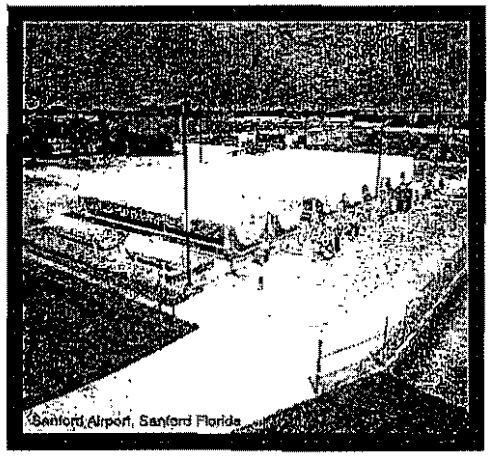
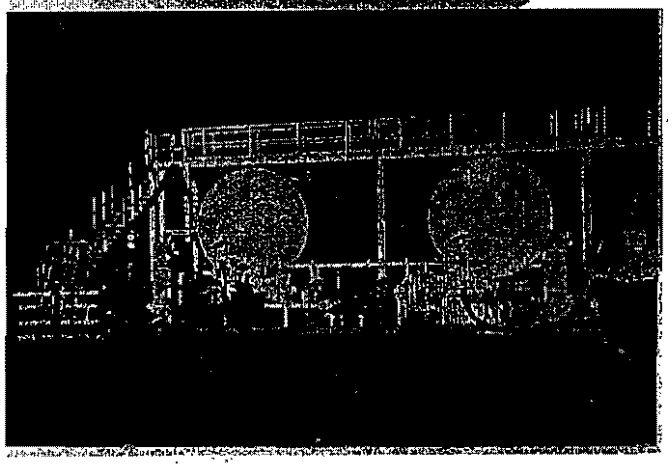
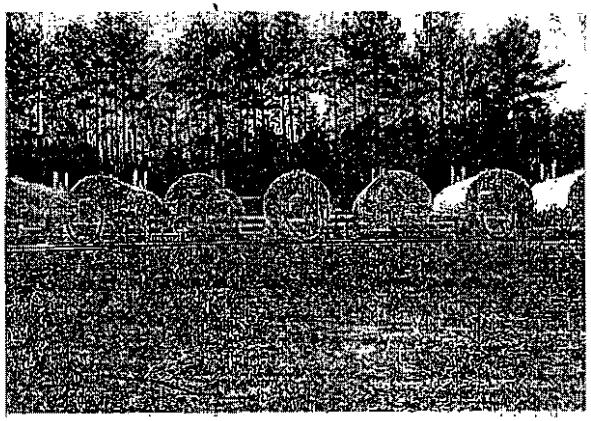
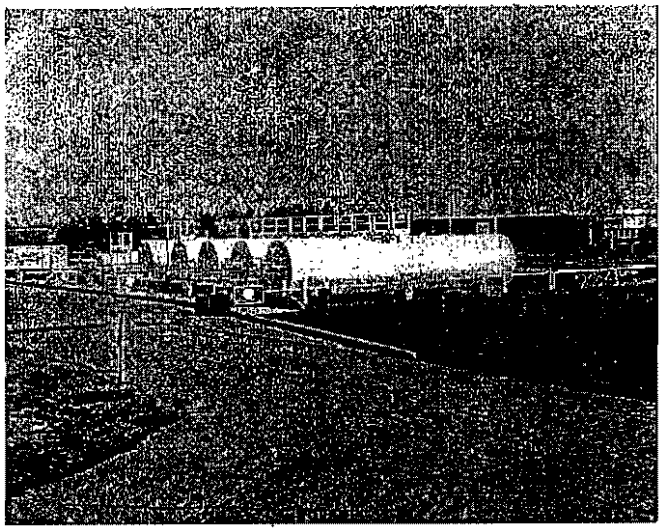
RAY YAGER
2/28/01

Fuel Farm Site Selections









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Addison! Airport

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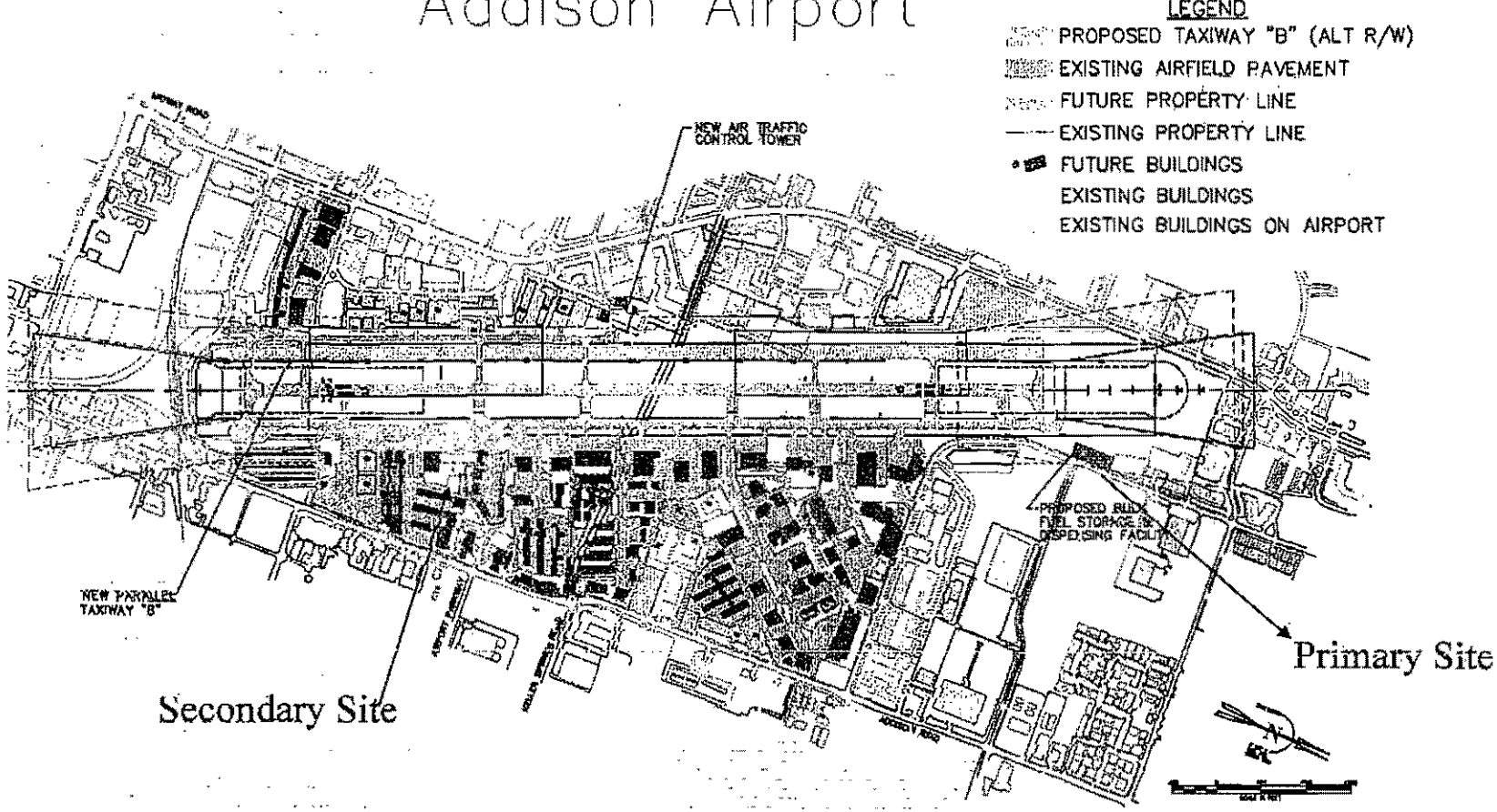
Addison Airport

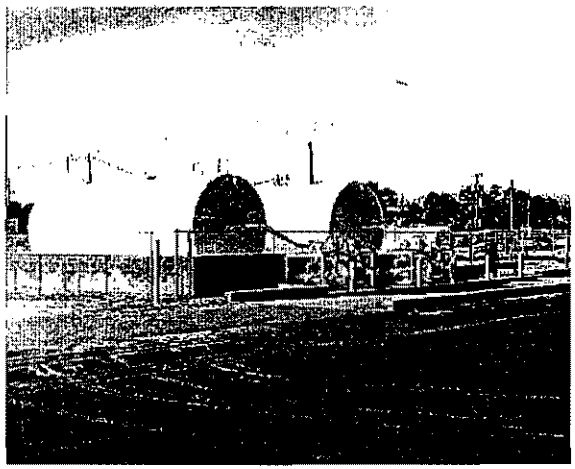


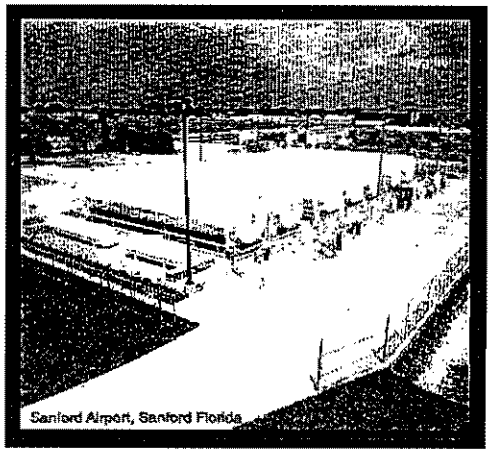
Washington

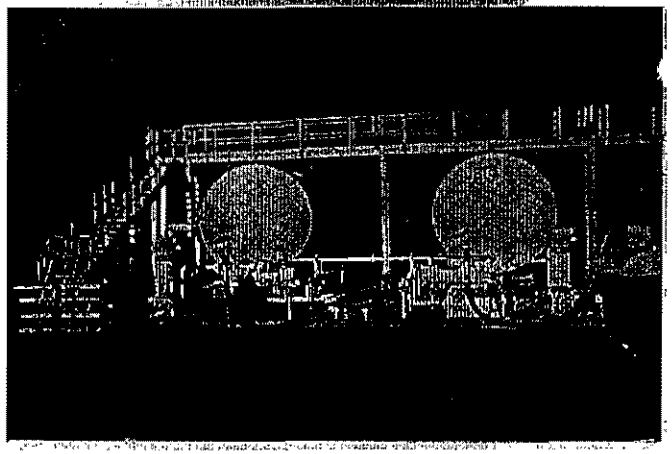
AIRPORT DEVELOPMENT CONCEPT DRAWING

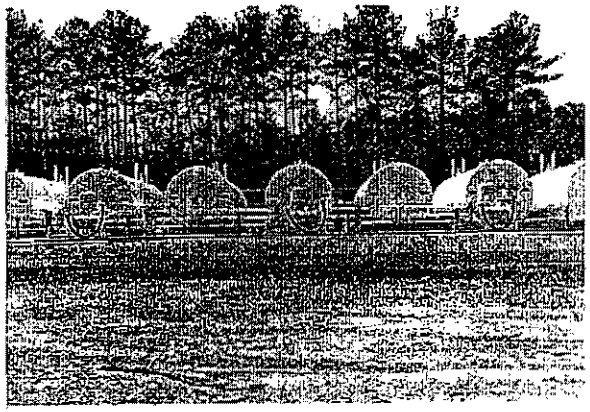
ADDISON AIRPORT
ADDISON, TEXAS

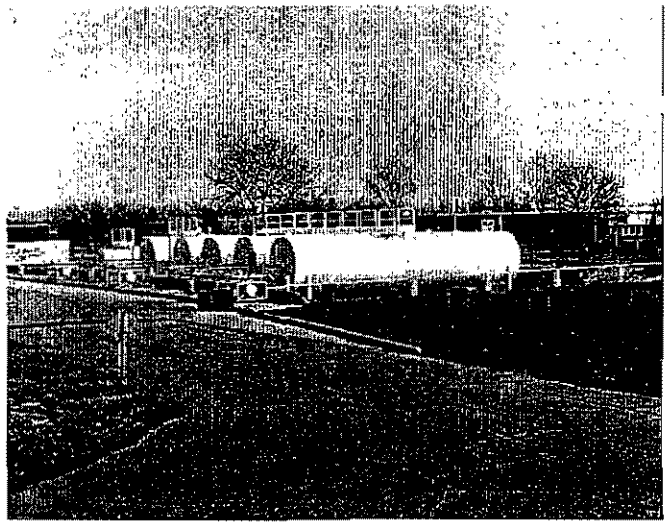
Fuel Farm Site Selections











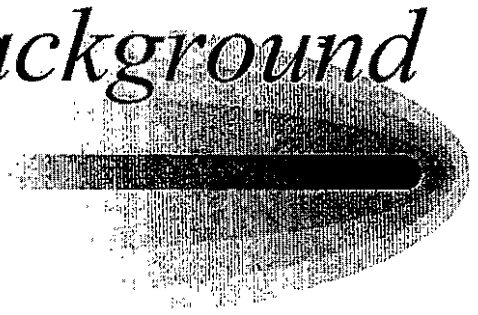
Overview

- Rules of engagement (ROE)
- Background
- Committee objectives
- Approach
- Existing conditions
- New site considerations
- Operating methodology
- Site options

Rules of Engagement

- Stay aligned to working with committee members
- All options assessed
- There are no bad suggestions
- It is OK to disagree
- Recommendations submitted to Council in October for November Council

Background



- Philosophy
- Ownership
- Tanks and condition
- Environmental
- Positive Action

Committee Objectives

- Recommend a potential fuel farm site
- Recommend operational methodology

Approach

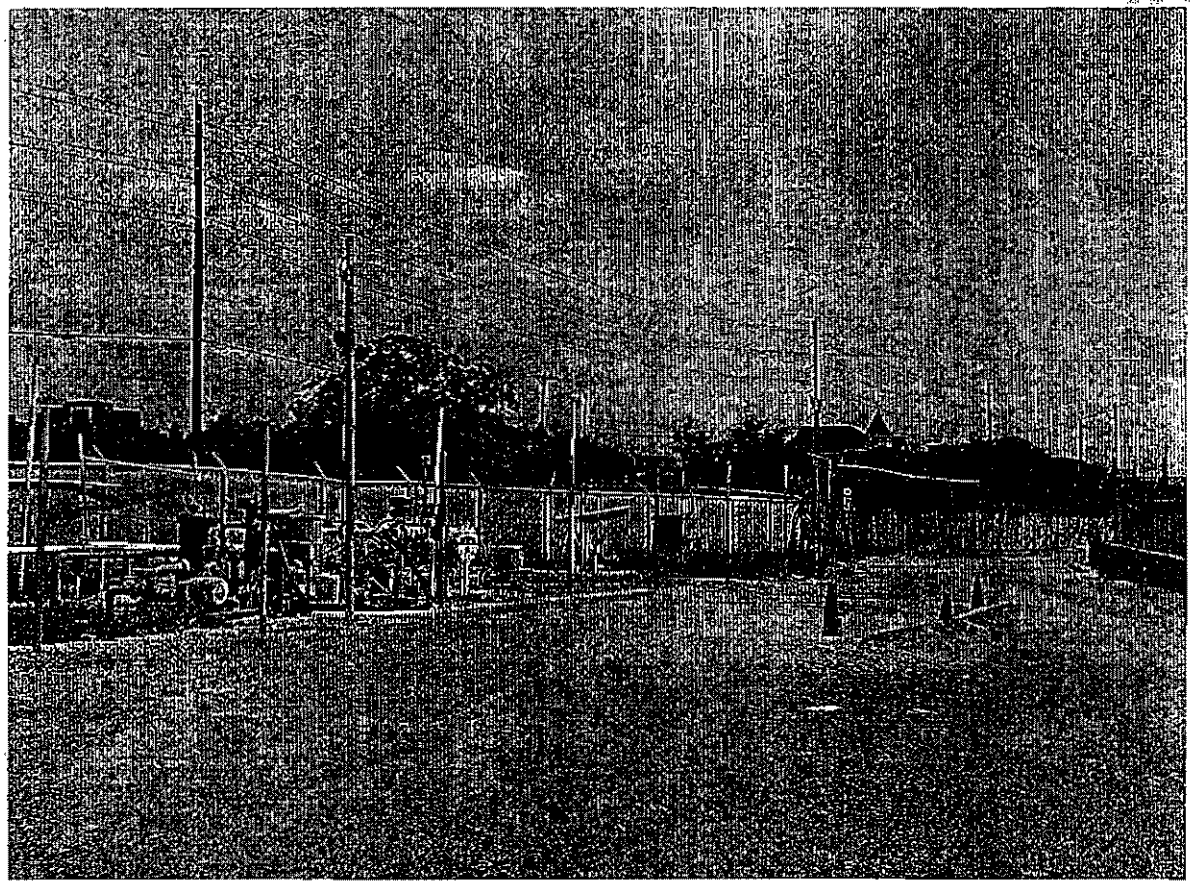
- Review & discuss 1997 Master Plan recommendations
- Assess other potential sites
- Obtain consensus of best site
- Discuss operational methodology
- Recommend methodology
- Transition to new fuel farm

Existing Conditions

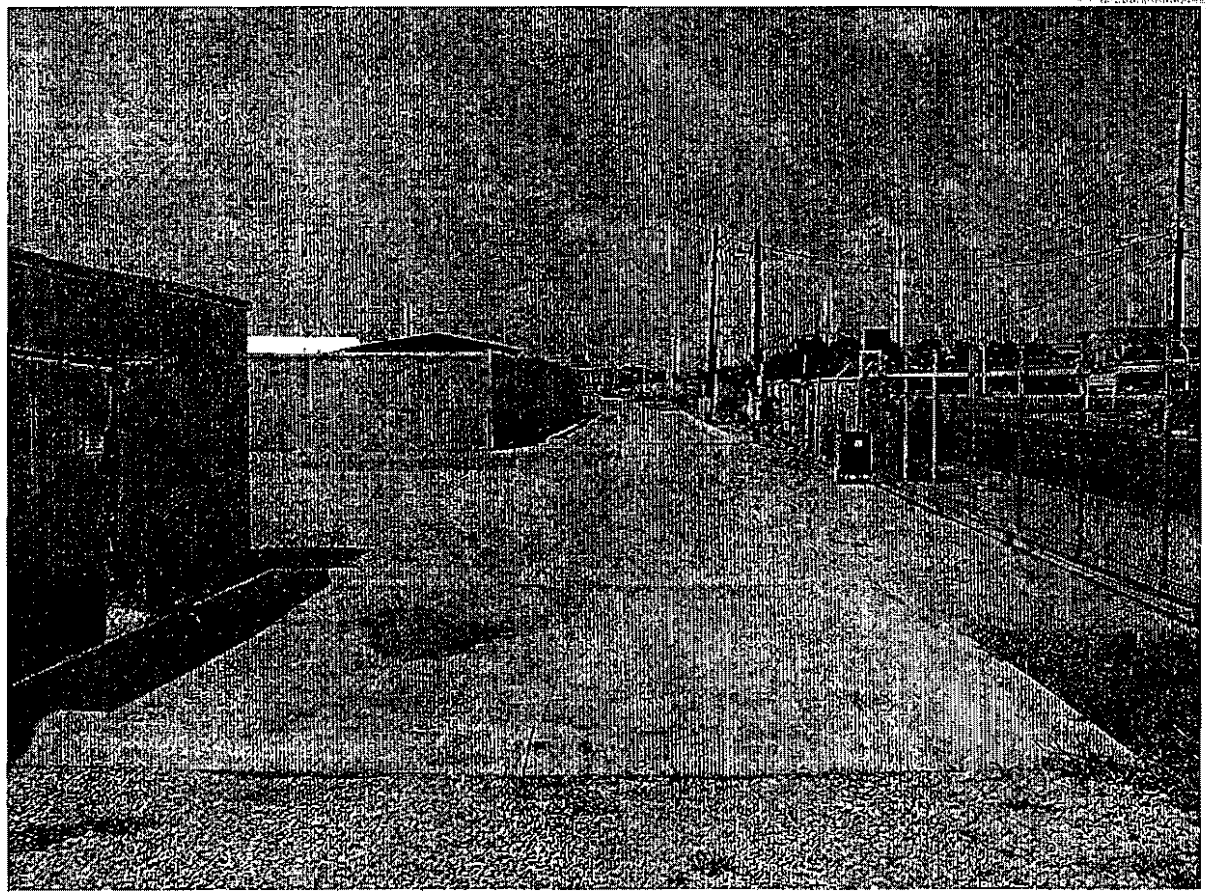
- Fuel farm configuration
- Location
- Operational requirements
- Phase I Environmental
- Phase II Environmental

Existing Fuel Farm

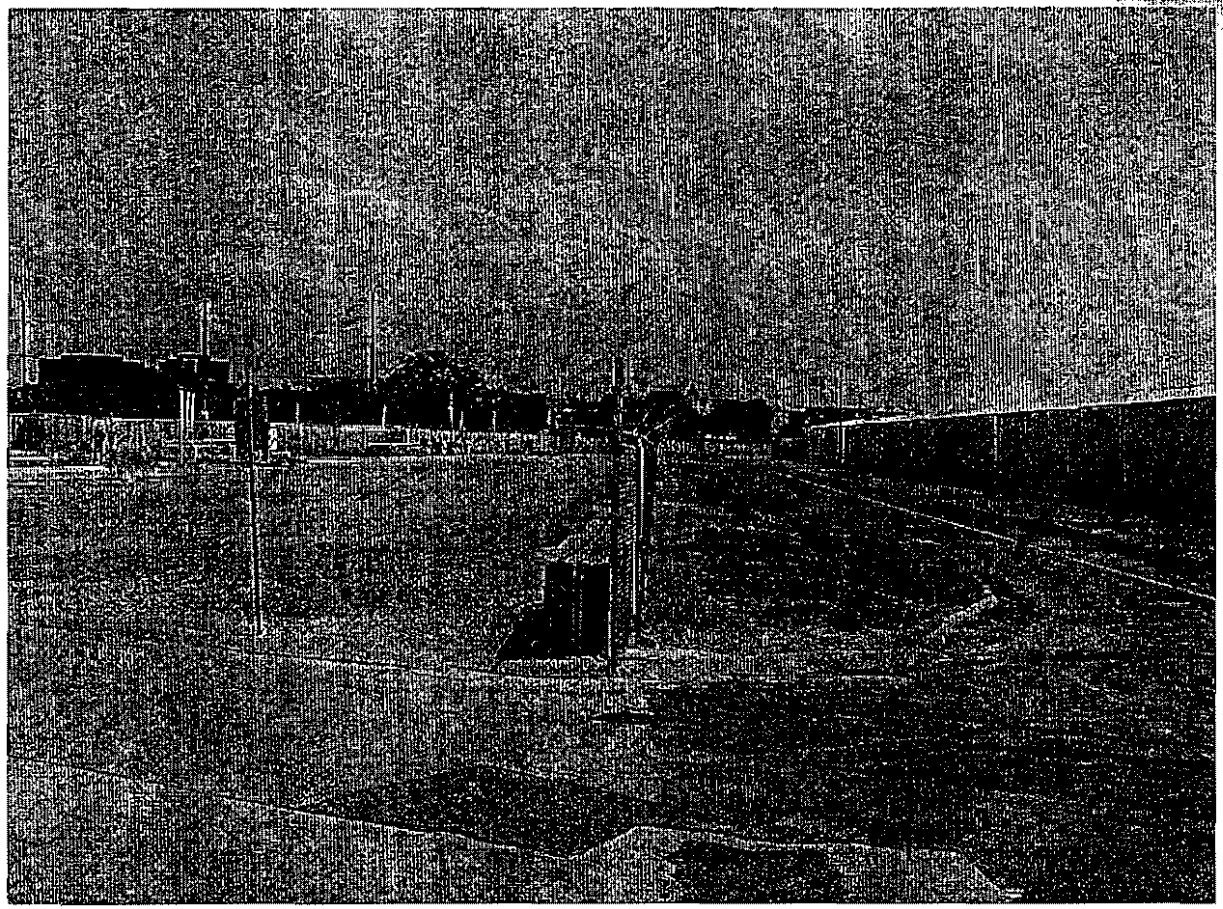
Existing Fuel Farm



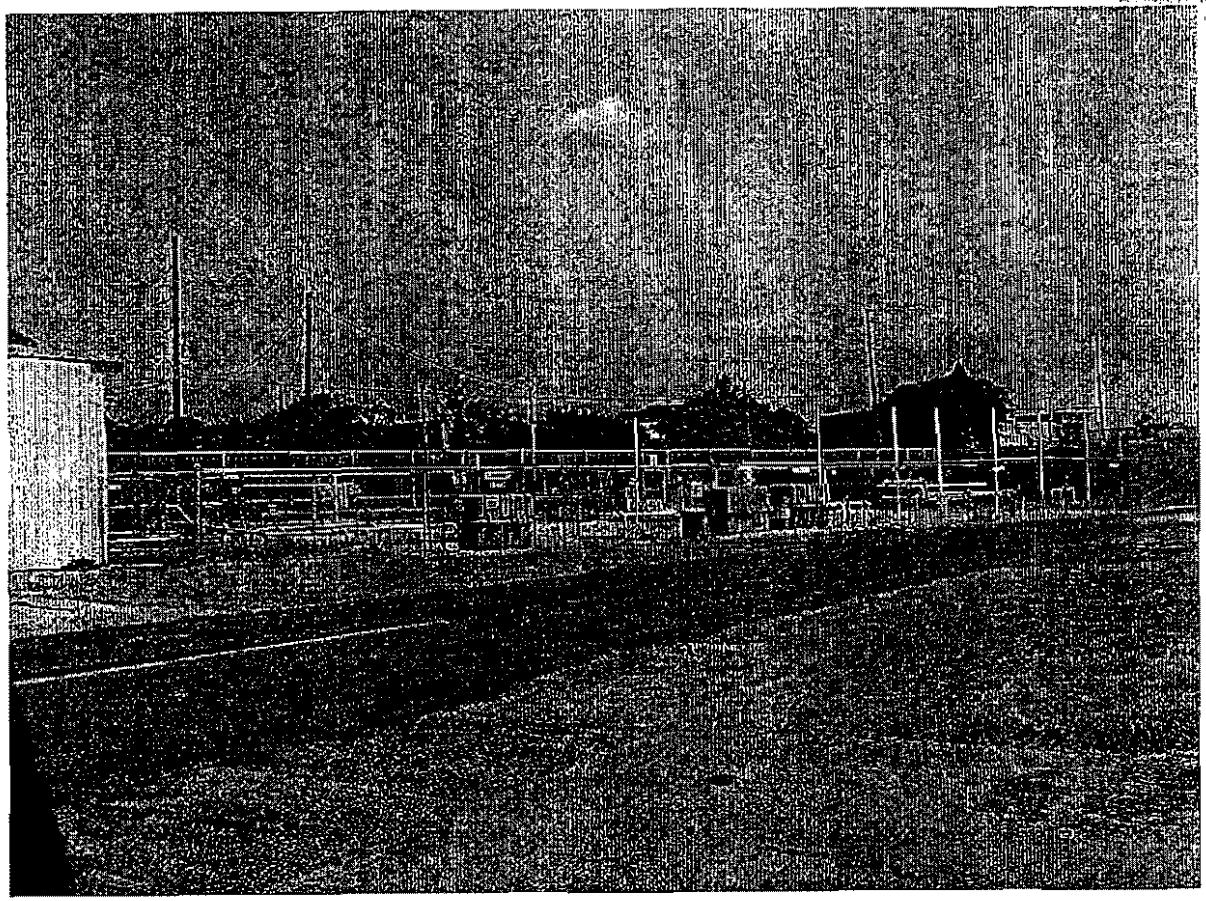
Existing Fuel Farm



Existing Fuel Farm



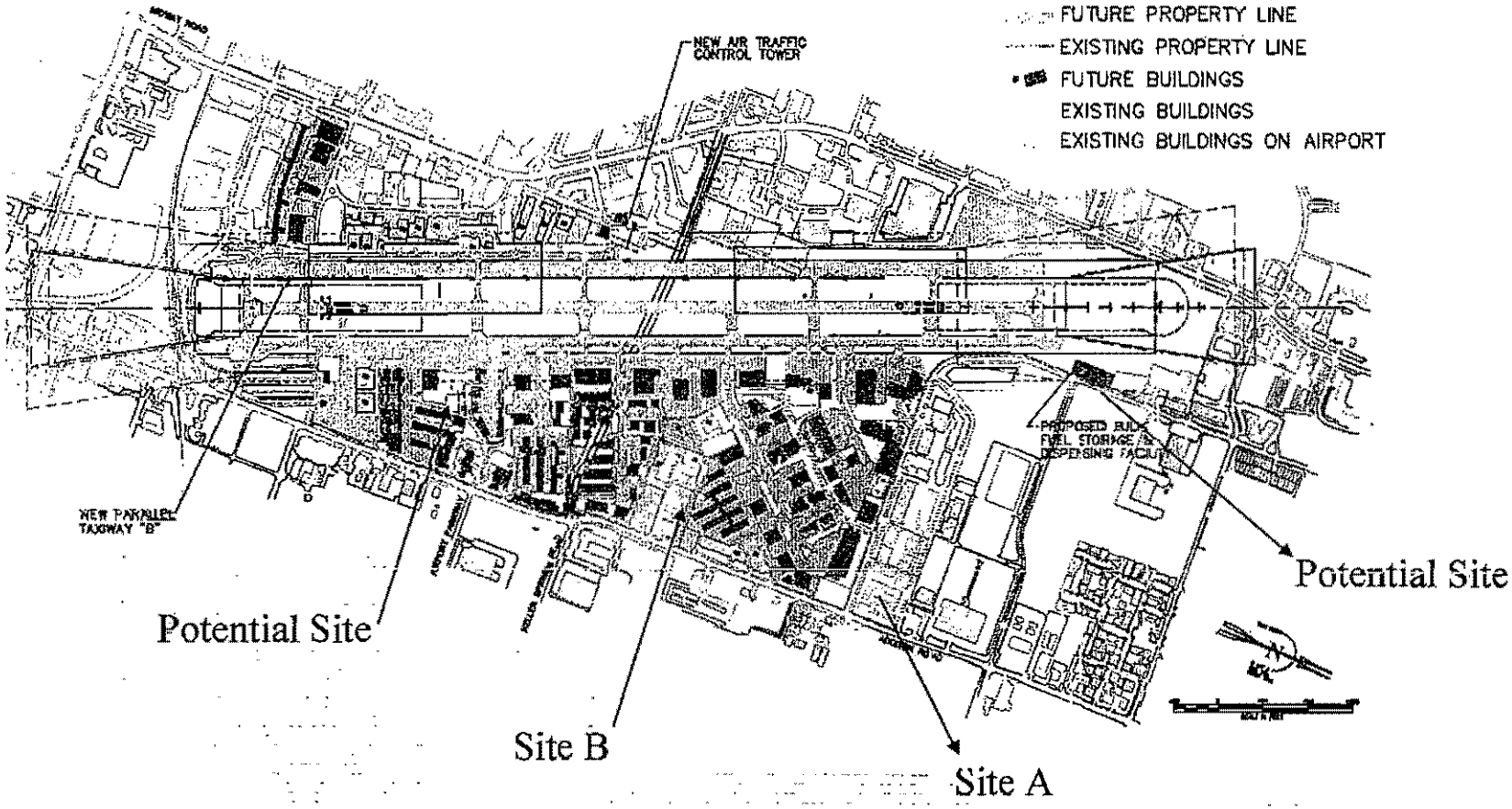
Existing Fuel Farm



New Site Considerations

- EPA & TNRCC compliance
- Safety
- Separation of airside & roadside traffic
- Location to users
- Integration with existing conditions
- Future conditions

Addison Airport



Washington

AIRPORT DEVELOPMENT CONCEPT DRAWING

ADDISON AIRPORT
ADDISON, TEXAS

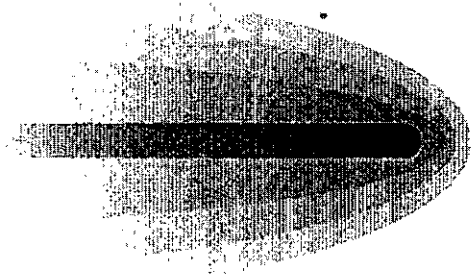
Operating Methodology

- Single source fuel to multiple providers
- Multiple tank owners with individual fuel providers
- Town constructs fuel farm & leases to providers
- Town leases land to fuel providers, they construct fuel farm

Single source fuel to multiple providers

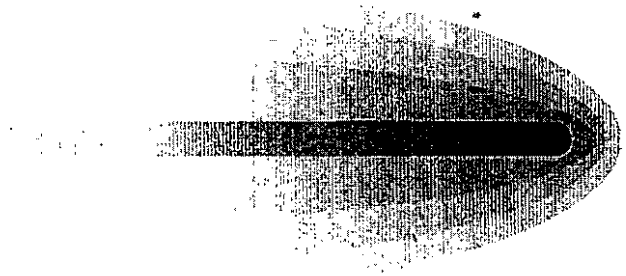
- Pros
- Cons

Multiple tank owners with individual fuel providers



- Pros
- Cons

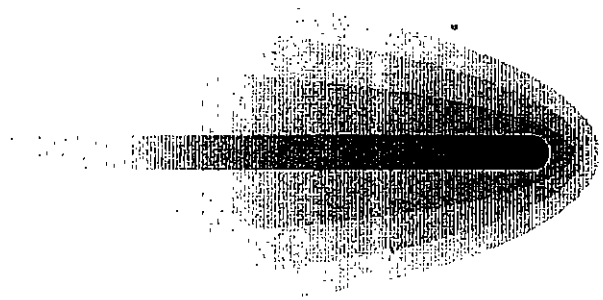
Town constructs fuel farm & leases to providers



- Pros

- Cons

Town leases land to fuel providers, they construct fuel farm



- Pros
- Cons

Washington
Industrial/Process

October 15, 2001

Mr. David Pearce
Washington Staubach
Addison Airport
4651 Airport Parkway
Addison, Texas 75001

Re: **Phase II Environmental Site Assessment**
Addison Airport Fuel Farm

Dear Mr. Pearce:

This letter reaffirms our position for the importance of conducting the field investigation at the airport fuel farm, as presented in our proposal, and accepted by the Town of Addison on August 15, 2001. The following items are indications that further investigation needs to be conducted in the vicinity of the existing fuel farm:

1. Records indicate spills of petroleum products have occurred without the necessary and required documentation on site. These have been known to occur subsequent to the State of Texas acknowledging the site had met closure requirements.
2. Fuel tanks have been abandoned without entering the closure process.
3. Identified tank locations not previously documented in the Phase I report.
4. History of spills and releases throughout the tank farm area.
5. Contractual obligation for baseline conditions to be established as part of Washington Staubach assuming airport operations.

We believe that any and all of these items warrant establishing an understanding of current subsurface conditions for the potential contamination from petroleum hydrocarbons. If you have any questions regarding this project, please call me at 281.529.8939.

Sincerely,
WASHINGTON GROUP INTERNATIONAL, INC.

Paul R. Wild

Paul R. Wild
Manager of Environmental Services
TNRCC Registered CAPM #00385

Addison Airport Fuel Farm Advisory Committee
Recommendation to City Council
November 13, 2001

Background and Current Situation

Jack Hopkins, GM of Million Air, Inc.

Discussion of fuel farm

- Number of tanks, in-use and abandoned
- Average life of tanks
- Current location
- Lack of contamination
- Condition of existing fuel farm

Reasons for relocating the fuel farm

- Long-range plans call for upgrading the airport facilities
- By moving the fuel farm, the land could be redeveloped into a more aesthetically pleasing purpose

Objectives and Recommendation

Laura Herrick, Addison Resident

Objectives

- Existing fuel farm operators do not wish to increase their operating costs (fuel flowage fees and ground leases).
- Most of the existing tanks have 10-20 years of useful life remaining, are in good operational condition, and the owners do not wish to lose their investment.
- If a new fuel farm can be built at the Town's expense and the operating costs are not increased, the fuel operators will agree to the relocation.

Recommendation

A. The committee recommends the following course of action for relocating the fuel farm:

1. The Town of Addison would build the new fuel farm at a recommended primary or secondary site (see B below).

2. Engineers hired to design the new fuel farm must have sign-off by current fuel tank owners/lessors before the design/plan is submitted to the Town for approval.

3. Current fuel tank owners/lessors may continue to use their existing tanks until the new tanks are operational.

4. Current fuel tank owners/lessors would allow the Town of Addison to remove and clean up the existing fuel farm at the Town's expense.

5. Town of Addison would bear the cost of removing/cleaning up abandoned tanks.

6. The Town of Addison would own the new fuel farm and lease tanks to fuel operators.

7. After the new fuel farm is in operation, the fuel flowage fee will be no higher than the current rate as of October 19, 2001

8. Lease rates for fuel tanks would remain at the level currently paid by Addison Express (or their successors) until the expiration of its current lease; for 20 years thereafter, lease rate increases will be tied to the current Addison Express rate plus CPI.

B. The committee recommends the following sites for the new fuel farm:

1. Primary site: Adjacent and South of the Service Center

2. Secondary site: Adjacent and West of the Police Station and existing tie-down area

C. The final selection of a site is dependent on the following criteria:

1. The site preserves existing approach minimums.
2. The site does not impede future development or improvements to approach minimums.
3. The final site selection is subject to FAA approval.

D. The committee will remain intact until the new fuel farm is operational.

E. The committee appointed Jack Hopkins and Laura Herrick co-chairmen of the committee. Jack and Laura will present these recommendations to the City Council on November 13, 2001.

Addison Airport Fuel Farm Advisory Committee
Minutes of the October 19, 2001 Meeting

I. Discussion of decision to relocate the existing fuel farm

A. Response to Phase I report made by CDM
* Documentation provided to update the status of the action items identified in the report
* Based on the Phase I report, there is no evidence of contamination

B. Reasons for relocating the fuel farm
* Based on the condition of the existing fuel farm, the Town of Addison is not able to obtain insurance
* Based on their age, some of the tanks need to be replaced
* When the old tanks are removed, contamination of the soil beneath and around the tanks may be revealed
* If contamination has occurred, remediation will be disruptive to the surrounding tanks
* Entering into a Voluntary Cleanup Program, as recommended by CDM, will be disruptive to the surrounding tanks
* The removal of older tanks will be disruptive to the surrounding tanks
* Long-range plans call for upgrading the fuel farm facilities.
* The condition of the airport has not been maintained as well as it could have been and upgrading of facilities is necessary.
* By moving the fuel farm, the land could be redeveloped into a more aesthetically pleasing purpose.

C. Objectives of fuel operators
* Existing tank owners/lessors do not wish to increase their operating costs (fuel flowage fees and ground leases).
* Most of the existing tanks have 10-20 years of useful life remaining and the owners do not wish to lose their investment.
* If a new fuel farm can be built at the Town's expense and the operating costs are not increased, the fuel operators will agree to the relocation.

D. Motions and amendments
* Councilman Barrett proposed a motion that was amended by Laura Herrick, Al Ranyak, Jack Hopkins, John Cummings and Ray Stern.

II. Recommendation to Town of Addison City Council

A. The committee recommends the following course of action for relocating the fuel farm:

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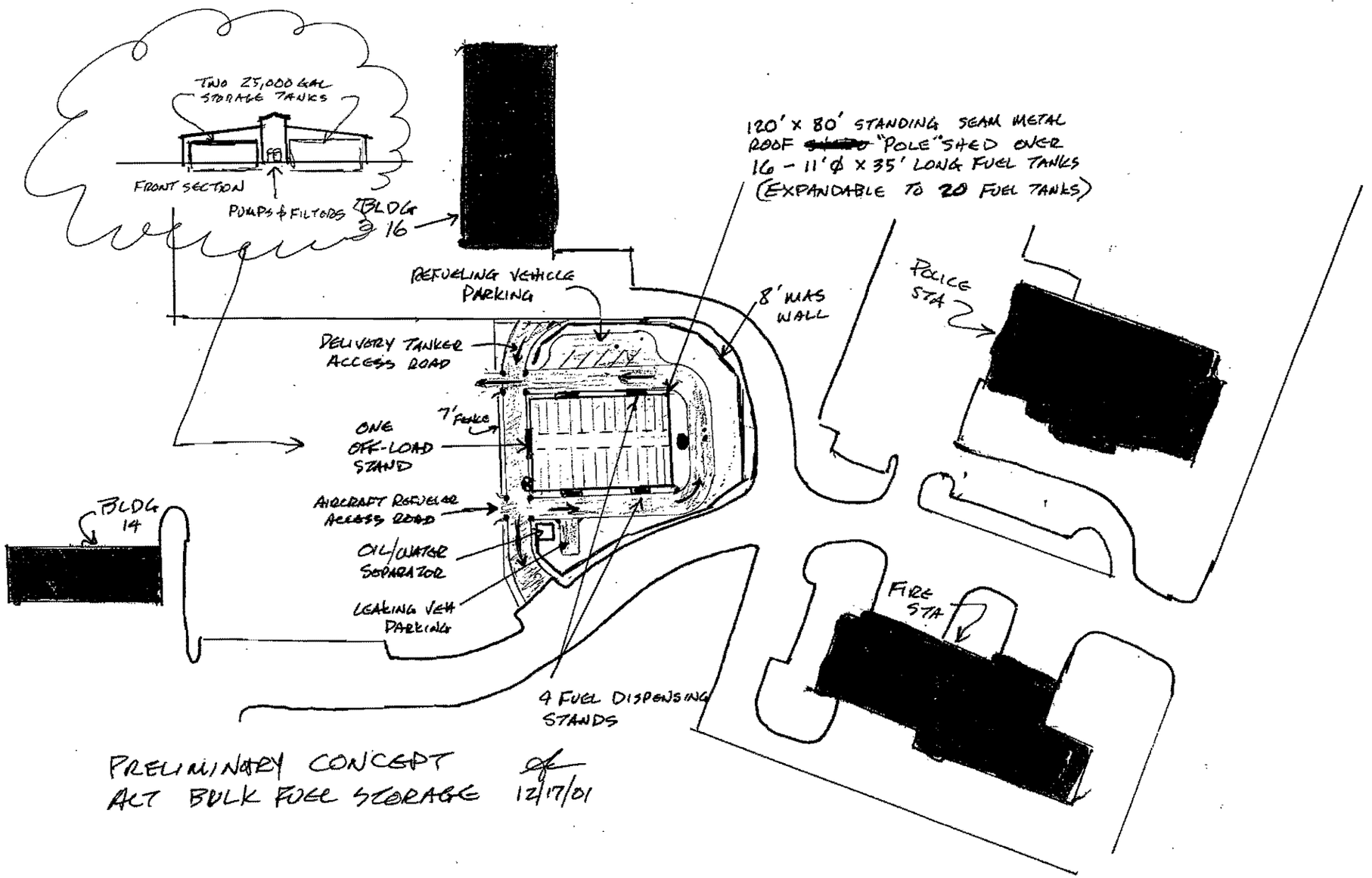

PRELIMINARY CONCEPT
ALT BULK FUEL STORAGE 12/17/01

SCALE 1"=100'

Project Schedule

Design and Construct New Fuel Farm

Addison Airport, Addison, Texas

Tasks	Estimated Time to Complete
Select Design Consultant	10 weeks
Topo Survey	4 weeks
Preliminary Design	4 weeks
FAA Preliminary Review Texas Approvals	6 weeks
Final Design	6 weeks
FAA Approval	4 weeks
Advertise, Bid, and Award Contract	6 weeks
Construction	20 weeks
Total	60 weeks

October 29, 2001

New Fuel farm Design & Const

Tasks	
Select Consultant	10 weeks
Topo Survey	4 weeks
Prelim Design	4 weeks
FAA Review, Tx Approvals	6 weeks
Final Design	6 weeks
FAA Approval	4 weeks
Bidding	6 weeks
Const.	20 weeks
	50 weeks

Selection Process:

Send out, receive RFQ	3 weeks
Review SOQ's, Select	3 weeks
Negotiate Contract	3 weeks
	9 weeks

Jim Pierce

From: samuel.lundgren@wgint.com
Sent: Thursday, October 25, 2001 5:07 PM
To: jpierce@ci.addison.tx.us
Cc: David_Pearce@staubach. com; macevedo@ci.addison.tx.us
Subject: FW: FUEL FARM PROCESS

Jim,
As Requested.
Sam

-----Original Message-----
From: Samuel Lundgren [mailto:samuel.lundgren@wgint.com]
Sent: Thursday, October 25, 2001 11:49 AM
To: David_Pearce@staubach.com
Cc: Neil Rood; Paul R Wild
Subject: RE: FUEL FARM PROCESS

Dave
Happy Thursday! How's this for your answer?

Design and Construction Time Estimate For Addison Airport, Addison, TX

Bulk Fuel Storage and Dispensing Facility

Design Estimate: Site Investigation & Survey
4 weeks
Mechanical/Electrical Design 6
weeks
Arch/Civil/Structural
Design 4 weeks
NEPA Documents and TX Approvals 4 weeks
Total Design Time
18 weeks

Bid Documents & Misc Contracting Support
1 week

Construction Estimate: Mob, Site work, pavement & utilities 25 days
Containment Structure and Pad
10 days
Storage tanks & piping
20 days
Controls and Equipment
15 days
Cover and structure
20 days
Contingency & weather
10 days
Total Construction Time
100 days

Assuming: For design, TX approvals will be FAA (site), TRNCC (fuel system
and NEPDES permit alteration) and EPA (for Dallas-Ft Worth air quality non-attainment review). For construction, fabricated tanks are ordered immediately upon contracting and can be delivery on site by day 40 of the

contract and that specific fue equipment/meters/filters are a
ordered
immediately for delivery on site by day 55 of the contract.

Please call if you have questions,

Sam Lundgren, P.E.
Project Manager, Airport Services
Washington Group Infrastructure
Phone (303)948-4041, Fax (303)948-4789

-----Original Message-----
From: David_Pearce@staubach.com [mailto:David_Pearce@staubach.com]
Sent: Thursday, October 25, 2001 10:05 AM
To: Samuel.Lundgren@wgint.com
Subject: FUEL FARM PROCESS

Sam-can you help me with this?
Dave
----- Forwarded by David Pearce/Staubach on 10/25/2001 11:16 AM -----

	cterry@ci.addi son.tx.us	To: jpierce@ci.addison.tx.us cc: macevedo@ci.addison.tx.us, David_Pearce@staubach.com
	10/25/2001 10:11 AM	Subject: FUEL FARM PROCESS

Jim,
I need to know the following for next Thursday night's
Council
Worksession:

What is the estimated time to complete the design and
construction
of a fuel farm if we started in January, 2002? Segment out for me the
design and the construction time estimates. What regulatory approvals
are
required to design, construct, commission and begin operation of a new
fuel
farm. These approval processes of all appropriate regulatory agencies
need
to be factored into the timeline. I am sure Dave can help you with
these
projections. I need this by Tuesday, 10/30 at 5:00 p.m. Don't worry -
we
are not planning to start building one in January, I just want to
understand
the process and required time to do so.
Thanks.

(As submitted to Dave Pearce, Airport Director on 10/25/01)

Design and Construction Time Estimate For Addison Airport

Bulk Fuel Storage and Dispensing Facility

Design Estimate:	
Site Investigation & Survey	4 weeks
Mechanical/Electrical Design	6 weeks
Arch/Civil/Structural Design	4 weeks
NEPA Documents and TX Approvals	4 weeks
Total Design Time	18 weeks
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Total Construction Time	100 days

Assuming: For design, TX approvals will be FAA (site), TRNCC (fuel system and NEPDES permit alteration) and EPA (for Dallas-Ft Worth air quality non-attainment review). For construction, fabricated tanks are ordered immediately upon contracting and can be delivery on site by day 40 of the contract and that specific fuels equipment/meters/filters are also ordered immediately for delivery on site by day 55 of the contract.

Please call if you have questions,

Sam Lundgren, P.E.
Project Manager, Airport Services
Washington Group Infrastructure
Phone (303) 948-4041, Fax (303) 948-4789

Jim Pierce

From: Chris Terry
Sent: Thursday, October 25, 2001 10:12 AM
To: Jim Pierce
Cc: Mark Acevedo; 'David_Pearce@staubach.com'
Subject: FUEL FARM PROCESS

Jim,

I need to know the following for next Thursday night's Council Worksession:

What is the estimated time to complete the design and construction of a fuel farm if we started in January, 2002? Segment out for me the design and the construction time estimates. What regulatory approvals are required to design, construct, commission and begin operation of a new fuel farm. These approval processes of all appropriate regulatory agencies need to be factored into the timeline. I am sure Dave can help you with these projections. I need this by Tuesday, 10/30 at 5:00 p.m. Don't worry - we are not planning to start building one in January, I just want to understand the process and required time to do so.

Thanks.

10/25/01- Call working to Brenda Chly

Rick Compton: FAA approval required 45 days needed
Prelim plans helpfull to check
airspace reqm'ts, ~~Safety~~ Zone consideration,
above, below ground

Sam Lundgren
Washington
303-948-~~4001~~
4041

MEMORANDUM

May 30, 2001

To: Ron Whitehead, City Manager

From: Chris Terry, Assistant City Manager

Subject: **FUEL FARM ADVISORY COMMITTEE**

It is time to begin work on our planning efforts to move and close the existing fuel farm on the Airport. This is a major infrastructure project for the Airport that will benefit from a planning effort involving various stakeholders and community leaders familiar with the Airport and its operations.

An item will appear on the June 12, 2001 Regular City Council Agenda which requests that the Council officially create and charge this special advisory committee with the work of researching, analyzing and recommending a preferred site for the new fuel farm and methodology for its operation. In advance of the Council meeting, staff wanted to allow the Councilmembers to begin considering individuals best suited to serve on this special advisory committee. Staff recommends a committee size limited to no more than 8-10 individuals. If each Councilmember knows of someone they would like to serve on the Committee, please have them forward such names to Michele Covino or me in advance of the June 12 Council meeting. Ideally, it would be helpful to receive such recommendations from the Councilmembers prior to next **Tuesday, June 5, 2001** so staff can identify the full roster of recommended individuals in the official Council packet to be distributed on Wednesday, June 6.

Generally, we believe this will be a 2-3 month work period for the committee which will be facilitated by Addison Airport Director, Dave Pearce. We anticipate that the committee will complete its work and return to the City Council with a final recommendation in August, 2001.

Dave Pearce has recommended that representatives from the three major FBOs serve on the committee. These individuals are: Jack Hopkins, MillionAir; Edward Morales, Addison Express and Jeff Smith, Mercury Air.

Additional information on this request will be included in the next Council packet. Should you have any questions, please give me a call.

CC: Dave Pearce
Mark Acevedo

CT

Jim Pierce

From: Jim Pierce
Sent: Monday, May 21, 2001 10:47 AM
To: Chris Terry; Mark Acevedo
Cc: David Pearce (E-mail); Michael Murphy
Subject: Airport Environmental

I have been in contact with Bob Owens of Environmental Innovations. Bob stated that he did not do any sampling at the airport. His main job for AATI was to prepare the Addison Airport Action Plan, May, 1998, which I have a copy of. Bob referred me to Todd Frazee of EA Engineering Science & Technology. Todd stated EA worked on two leaking petroleum storage tank sites on the airport. One was the Texas Pro Air site at which tanks were removed in the late 80's. EA received closure on this site last year. The other site was a 12 tank site that AATI leased and sub leased. This site is closed except for plugging the remaining monitoring wells. Todd agreed to send me copies of the closure info for these sites.

EA also prepared a Storm Water Pollution Prevention Plan and a Spill Prevention Control and Countermeasure Plan for the airport. Todd said he would send me a copy of each.

Jim Pierce, P.E.
Assistant Public Works Director
PO Box 9010
Addison, TX 75001-9010
972-450-2879

Recommendations and Scope of Work
For
Bulk Fuel Storage and Dispensing Facility
And
Underground Fuel Storage Tank Removal

Prepared for Addison Airport
Addison, Texas

1. **Tasking:**
The Town of Addison requested Washington Infrastructure to perform a review, make recommendations and develop the scope of work for design of a replacement Bulk Fuel Storage Facility. The design and subsequent construction is to be accomplished in conjunction with the removal of all existing Underground Fuel Storage Tanks, as specified in the to be developed and approved Underground Fuel Storage Tank Removal Plan.

2. **References:**
Addison Airport ALP (Barnard Dunkelberg & Co), dated May 1999, and Addison Airport 10 year CIP (Shimek, Jacobs & Finklea, LLP), dated Feb 2000
Phase I Environmental Site Assessment Update (Camp Dresser & McKee), dated Feb 1, 2001
Addison Airport Development Drawing (Washington Infrastructure), dated Oct 30, 2000.

3. **Background:**
Although the Capital Improvement Program (CIP) for Addison Airport, does not specifically address an upgrade or replacement Bulk Fuel Storage and Dispensing facility, the current status and regulatory requirements for the numerous underground fuel storage tanks on Airport property mandate action. The referenced Phase I Environmental Site Assessment indicates a need to control bulk fuel storage and dispensing, including the installation of environmental protection and spill prevention systems, along with the necessity of bringing the Airport into compliance with the current Underground Storage Tanks (UST) requirements. A do nothing alternative is not discussed because of the mandated upgrades required for the systems and because closing the airport is not considered a reasonable or viable option.

4. **Discussion: Centralized Bulk Fuel Storage and Dispensing versus Decentralized**
The existing decentralized bulk fuel storage and dispensing systems are convenient for the tenant operators on the Airport. However, as indicated in the Phase I Environmental Assessment, and subsequent actions by the Airport's insurance carrier, environmental and spill prevention controls, along with operational and spill response accountability are not up to current requirements or standards. As the Airport property owner, the Town of Addison is responsible for oversight and management of environmental requirements and will face increased liability for poor management practices. In comparing the convenience of decentralized bulk fuel storage and dispensing facilities versus a centralized system on the Airport, a centralized system allows for better security and effective management and monitoring of operations as well as the installation of standardized storage systems with appropriate environmental and spill prevention controls. In addition, a new centralized system

could be constructed in a large berm/diked containment area that would prevent catastrophic tank leakage and fuel release. A centralized system also allows the installation of spill collections systems under the bulk fuel unload and dispensing stands, to safely collect inadvertent spills into an oil/water separator. Finally, the cost of retrofitting appropriate environmental and spill prevention controls, plus the cost to either install double wall underground fuel storage tanks with leak detection, or the area and cost to berm/dike new single wall above ground fuel storage tanks at each decentralized location, makes a centralized storage and dispensing facility a more cost effective alternative.

Recommendation Number 1:

The Town of Addison and the Airport mandate that all bulk fuel storage and dispensing systems on the Airport are to be constructed in a centralized location with the appropriate containment and spill collection systems.

5. **Proposed Location for a new Centralized Bulk Fuel Storage and Dispensing Facility:**
A proposed location for the "Future Fuel Farms" was identified on the May 1999 Airport Layout Plan (ALP); however, the site is not currently owned by the Airport. In addition, questions of land use and zoning compatibility could be raised, since the surrounding area and facilities are commercial/business, not industrial, and aircraft refuel truck access to the aircraft parking areas could be a problem. Some concerns may also be raised about large over the road tanker trucks accessing the site for bulk fuel delivery. Several alternative locations are possible; however, for existing property owned by the Airport, a new proposed location was identified on the North side of the airport, from the intersection of Bent Tree Plaza, along Westgrove Road, adjacent to the Town Servicing Yard and Facilities. Construction would be outside the existing east Runway Obstacle Free Area line, but inside the 20 foot Building Restriction Line, which will make height of facilities a factor for design. The location is compatible with the Town Servicing Yard activities and also provides an opportunity to install a Town use, gas/diesel vehicle dispensing pump, while providing for bulk storage within the Airport site. The greatest disadvantage of the location is that construction heights will be limited and the site is in the proposed "Future Approach" Runway Protection Zone. Construction of the Bulk Fuel Storage Facility on this site will preclude upgrading Runway 15, as listed on the May 1999 ALP, to a higher category precision instrument approach.

Recommendation Number 2:

A review of the proposed Bulk Fuel Storage Site, along with all identified alternatives, should be accomplished by an Airport Review committee to verify siting criteria and other considerations, with the selected site to be submitted to FAA for final approval. Specific consideration should be given to current and future runway protection zone requirements and runway/ILS development.

6. **Airport Ownership versus Supplier Ownership of Storage Tanks and Dispensing Equipment:**
The key factors to consider in determining ownership of the storage tanks and dispensing equipment include available funds, risk management, desire and ability to maintain the system

and stability of the users. If the Town/Airport has sufficient funding available and desires to make the up-front investment in a new storage and dispensing system, they can recover the investment by long term leasing of storage and dispensing to users. The advantages are construction of standardized storage tanks and dispensing equipment, common operation and maintenance procedures, and if any user develops financial problems, the storage and equipment is owned by the Airport and will not be included in any bankruptcy proceedings. The disadvantages are that the Town/Airport must maintain the tanks and equipment either by contract or with in house personnel, and the Airport keeps liability for the storage tanks and dispensing equipment, along with the site. If the Tenant/FBO/Supplier installs the bulk storage and dispensing equipment, installed items should be specified and approved by the Airport for standardization of tank size, material and construction, along with commonality of dispensing equipment. If tank and dispensing equipment is provided and installed by the Tenant/FBO, lease documents should provide for immediate acquisition by the Airport at the amortized value of the equipment if the operator develops financial problems.

Recommendation Number 3:

To limit environmental liability, insure uniform equipment, construction standards and operations, the Town should construct the Bulk Fuel Storage and Dispensing Facility and lease the required equipment and storage tanks to the Supplier/Operator/FBO.

7. **Single bulk fuel storage system versus multi-supplier system**
A single bulk fuel storage and dispensing system is the most efficient from a cost and space utilization perspective; however, if a single system is used to supply all users of the Airport, then the system should be owned by the Airport. This will also require the Airport to competitively bid the total airfield fuel requirement on an annual or biennial basis and all users must purchase from this supply. The advantages are generally a lower per gallon price and a stable price to the user over the life of the supply contract; however, with market fluctuation, if the cost per gallon declines after the contract, the user will still pay the same. In short, the Airport is buying all fuels and the users buy fuels from the Airport and there is no competition after the Airport contracts for the best price available at time of contract. Since there is no market competition after contract, if the price of fuel goes up, it's a good deal and if it goes down, the contract becomes a poor deal. Current FBO arrangements with branded fuel suppliers could be impacted by a single fuel storage operation. The decision to take the Airport into the aviation fuel market as a supplier should be carefully considered by Airport and Town management.

Recommendation Number 4:

Because space limitation is not an issue and there is a desire for supplier competition, along with ease of operation, a multi-supplier operation is recommended.

8. **Bulk fuel storage system Options:**

- **Combined Use Storage Facility with Shared Off-Load/Dispensing Facility**

This option may be the best option in terms of space use and total cost. With a combined use storage facility, one large fuel storage complex could be designed with secondary containment designed for the largest storage tank in the complex. This method allows maximum flexibility for future needs and provides for maximum storage capacity in the minimum area used. The shared on-load/dispensing equipment also economizes on space use as well as cost, since only one storage and dispensing system is constructed. The storage tanks would use a card or key system to track withdrawal from the system by each user. This system would work with one supplier, competitively bid by the Airport, for all airport users. Some disadvantages of this system is that all users share the facility, which could be an operational/maintenance problem, which will be an Airport responsibility, and there is increased liability risk to the Airport. If a spill occurs, it also may be more difficult to track responsibility.

- **Combined Use Off-Load and Storage Facility with Individual Dispensing Facilities**
  This option varies from the above option in that there is one selected fuel supplier and bulk fuel storage source which is dispensed to individual Tenant/FBO for convenience of accounting and access to the stored bulk aviation fuel.

- **Individual Storage Facilities using a Combined Use Off-Load/Dispensing Facility**
  This option varies from the first in that one Off-Load/Dispensing Stand would use electronically controlled pumps to place off-loaded fuel into the correct bulk fuel storage tank and electronically controlled dispensing pump would select fuel from the correct bulk fuel storage tank to fill aircraft fuel servicing trucks. Advantage is a little less space required for Combined Off-Load/Dispensing facility, but the design of the electronically controlled pump/manifold system is critical and there will be some product remaining in the dispensing piping after delivery, which goes to the next user.

- **Consolidated Individual Facilities for Each Aviation Fuel Operators**
  This concept is that each Tenant/FBO/Supplier has an individual bulk fuel storage and dispensing system, either leased from the Airport or owned, within the Airport Bulk Fuel Storage site. If equipment and storage tanks are built by the users/suppliers, they follow Airport mandated standards for construction on the Airport owned site and the equipment and storage tanks are maintained by the user/supplier. Individual storage and dispensing equipment can be either Airport or Tenant/FBO/Supplier installed and owned. The advantage is that each storage and dispensing system is operated by the user, for clear delineation of accounting and responsibility, plus consolidated individual systems minimizes liability to the Airport. The greatest disadvantage is the individual system requires more area for construction.

Recommendation Number 5:

Individual bulk fuel storage tanks, off-load and dispensing systems, consolidated in one environmentally protected site, including covered tanks and operating equipment, with suitable architectural considerations to blend into the site and constructed by the Airport, for long term lease to suppliers, operators or FBOs.

9. **Other Considerations:**

Industry standard filtering systems with automatic shutdown and alarms should be installed on the Off-Load side of the Storage Tanks, to protect product in the fuel storage tanks. Overflow protection devices should be installed on all Fuel storage tanks and connected to the pump control panel. Pump/Dispensing Control panel or panels, should be logically sequenced, gauged to fuel storage tanks for fuel level indication, and clearly marked for ease of operations. An oil/water separator should be installed and connected to the bermed containment area, using a valved connection and the Off-Load/Dispensing pad to allow for immediate wash-down of any spilled product. The Off-Load/Dispensing Pad should be large enough to provide a designated parking spot for any aircraft refueler vehicle that develops a leak. Fuel storage area should have explosion proof electrical fixtures and control panel. An 1 ½" water line will be required for emergency eye wash unit and a 1" hose and reel unit installed for wash down. The hose must reach all areas of the facility, including the oil/water separator. An emergency telephone/intercom/transmitter device should be installed with direct link to the Fire Station alarm room. Use of a concrete low wall would allow a more compact containment berm area and would also allow lowering the storage tank area by two to three feet, if FAA Part 77 geometry is a problem, or for appearance, if desired. Installing a panel and frame roof system, that allows access to storage tanks, would minimize rainfall into the containment area. This would also allow the containment area to be valve connected to a smaller oil/water separator so that any major spill in the containment area can be washed down and pumped out through the oil/water separator. A panel and frame roof system would also enhance the facility appearance from outside the Airport property. Access from the outside (airport land side) should be controlled with electrically operated gates and a code or key access pad. Paved access will be required from the street and from Taxiway "A." Street connection should include driveways, curb and gutter. If desired, the Town's diesel and mogas storage tanks could be included in this project, with dispensing pad located within the Town Maintenance yard area. Finally, recommend fuel spill neutralizing agent be stored in the covered area of the facility. The estimated cost for construction of the Bulk Fuel Storage and Dispensing Facility, as outlined above, is $2,800,000.

10. Scope of work:

In accordance with recommendations one through five, plus paragraph 9, above, and including all other appropriate guidance and recommendations from the Town Management, provide comprehensive design services and the production of bid documents for the new Bulk Fuels Storage and Dispensing Facility at Addison Airport. Service should include developing an Environmental Assessment (EA) or a Category Exclusion (CATEX) document, as required, a detailed engineers construction estimate, construction acquisition process support, bid result review, and optional construction management and inspection, and project close-out/as-built service, if desired by the Airport and Town. The estimate for comprehensive design services as listed above, without optional Construction Support Services, is $248,500.

CONCEPTUAL SCOPE OF WORK
For Underground Fuel Storage Tank Removal

1. Discussion:

The following narrative describes the typical activities and possible results of the Underground Storage Tank (UST) removal and environmental remediation program at Addison Airport. The narrative is not in itself a detailed scope of work but is intended to provide guidance to Airport and Town Management on Environmental Consultant requirements and to support efforts in obtaining qualified contractors consultants to successfully execute the Airport UST removal program. Environmental Consultant and Management functions are required at the Airport to oversee construction, evaluation, remedial actions, and monitoring of possible problem sites, and to assist with qualified contractor selection. In addition to a Comprehensive Site Assessment, the Environmental Engineer must be prepared to rapidly accomplish specific tasks, such as contamination assessment for sites discovered during construction, in an effort to accomplish the UST removal as expeditiously and cost effectively as possible.

2. Background and Tasking:

From best information available and according to the referenced Phase I Environmental Site Assessment Update, 29 registered Underground Storage Tanks (USTs) and one unregistered above ground storage tank are located at the airport, of which 15 USTs are currently inactive. The remaining 14 active USTs and one above ground storage tank must remain in service until a new bulk fuel storage and dispensing facility has been constructed or suitable temporary alternatives are available. There is also concern that additional unregistered above ground and underground fuel storage tanks may be on the Airport. It is assumed that the new construction site will be on the Airport and that the Airport and Town will provide general or specific management and oversight of the new facility. In addition, the Airport and Town desire that the 15 inactive USTs be fully taken out of service and have final actions accomplished, which would be defined as either permanent abandonment in place or removal. Subsequent to the activation of the new bulk fuel storage and dispensing facility at the Airport, the remaining 14 USTs will be taken out of service and permanently abandoned or removed. For all USTs, removal is the preferred option, unless utility lines or structures would be at substantial risk from removal operations, or the associated cost of removal is excessive. Based on the available information and conditions on site, the most efficient and effective process for comprehensive removal of all USTs at Addison Airport will be to first investigate, categorize and develop a baseline, then develop a UST removal/compliance/remediation plan, based on the investigation. After plan approval, proceed with UST removal or permanent abandonment by a licensed UST removal contractor and accomplish final remediation on each site, as required.

3. Environmental Baseline Survey and Investigation:

An investigation is required to determine site conditions at each UST and establish a Baseline for the Airport that clearly indicates the environmental status of the Airport with new Airport Management and Operations. The Phase I Environmental Site Assessment Update indicates several incidences of hydrocarbon spills to the surface. Although existing USTs should have been at least tank tightness tested, these documented spills, potential undocumented spills and associated underground piping leakage would not be detected using only a tank tightness test. A

soil gas analysis should be accomplished on all USTs as soon as possible to evaluate current subsurface conditions relative to the possible presence of hydrocarbons from released fuels. Soil gas analysis is a sensitive, relatively accurate, and relatively inexpensive method of identifying impacts to geologic media. For this reason, a soil gas analysis should be conducted in the areas of the USTs and/or identified spill areas. The soil gas analysis will be key information in developing the Airport Environmental Baseline Survey and Investigation. The Environmental Consultant should also perform an extensive document, construction plan, and inspection report review of all bulk fuel storage tanks and related piping on the Airport as part of the Investigation. If the Investigation determines that one or more of the current operational underground fuel storage tanks are leaking, TNRCC must be notified and the operator must immediately take that tank out of service and/or take corrective action. The Environmental Consultant should work with the operator to develop reasonable temporary fuel storage options until the new system can be constructed. In the event that soil gas analysis indicates the probability of impacted geologic media, Texas Natural Resource Conservation Commission (TNRCC) regulations would require that a Comprehensive Site Assessment be conducted to determine the extent and magnitude of the impacts. This would include soil borings, monitoring wells, analytical testing, a receptor survey, and a human health risk assessment, at a minimum. The Environmental Consultant should conduct this work for the Airport and Town under the direction of a TNRCC-registered Corrective Action Project Manager.

4. Development of detailed UST Removal/Compliance/Remediation Plans and Specifications:

In some cases, it may be more cost effective to abandon tanks in place because of safety issues. This is more likely to be the case when utility lines and structures will be placed at risk because of excavation and removal activities. Otherwise, removal of all tanks to eliminate future liabilities is recommended. The Environmental Consultant will develop detailed plans and specifications to function as bid documents for tank abandonment and/or removal by qualified tank removal contractors. The Environmental Consultant should also conduct an Applicable or Relevant and Appropriate Regulations Analysis to identify regulations or reasonably accepted practices that must be, or reasonably should be, complied with for the tank abandonment/removal and remediation programs. This effort assists in identifying Federal, State, County, and Town laws, regulations, and ordinances that are mandatory, including identification of any wastewater discharge permits/approvals, air emissions permits/approvals, waste disposal permits/approvals, and construction permits. It will also help to identify industry accepted practices, such as American Petroleum Institute and American National Standards Institute standards, that are not necessarily mandatory by regulation but which constitute "best practices."

5. Tank abandonment or removal:

In accordance with the Airport and Town's desire to permanently remove the tanks from service, the Environmental Consultant should assist the Airport and Town with selection of a qualified contractor(s) to conduct tank abandonment or removal. Activities include but are not limited to: site preparation (drain the lines and tanks, remove and dispose or re-use fuels, remove ancillary equipment), remove flammable vapors, test tank atmosphere, fill tanks with inert material or remove them, backfill pit with clean fill soil, dispose waste soils, dispose tanks, etc. The Environmental Consultant should monitor and document the removal and remediation activities of the selected contractor(s) and report progress and compliance with statutory requirements and

contractual obligations for tank abandonment and/or removal. A detailed, site-specific health and safety plan for the tank abandonment/removal process and for all remediation activities should be developed by the contractor and reviewed by the Environmental Consultant on behalf of the Airport and Town. Soils must be excavated from the tank pits to allow access to the tanks for backfilling or removal. Excavated soils that are not impacted by hydrocarbons can be used for backfill; otherwise, clean soils must be brought from a borrow source for backfilling. Soils unsuitable as backfill, either because of poor geotechnical properties or contamination, must be disposed properly. Contaminated soils will be tested to determine contaminant levels, which will then define the type of disposal facility that is suitable. In some situations, contaminated soils may be subjected to a treatment process, such as bio-remediation or thermal desorption, if it appears cost effective or is necessary because of Federal Land Disposal Restrictions. Waste fuels, i.e. fuels unsuitable for use in aircraft, must be disposed properly. Tank sediments and emulsions, consisting of corrosion byproducts, water, soil particles, and other detritus, must also be disposed properly. Construction equipment wash waters, contaminated personal protective equipment, sampling devices, and all other waste produced as part of the abandonment/removal activities must be properly characterized and disposed. For either abandonment/removal or remediation activities, soil, water, and wastes must be analyzed for hydrocarbons in order to properly characterize and categorize them. Analytical test methods will be those approved by the U.S. EPA and TNRCC. The Environmental Consultant should define the analytical program and conduct the testing with a National Environmental Laboratory Accreditation Program approved lab or other lab that can demonstrate participation in an auditing program administered by a regulatory agency or nationally-recognized standards organization. Once the Applicable or Relevant and Appropriate Regulations Analysis is completed, the Environmental Consultant should either assist the Airport and Town with obtaining the permits, approvals, and required plans (such plans function as permits by rule) or will monitor the activities of contractors and consultants that are obtaining the permits, approvals, and plans on behalf of the Airport and Town. Such permits/approvals/plans typically include but are not limited to wastewater discharge permits to municipal sewer systems, air permits, waste disposal authorizations from permitted disposal facilities, one-time waste generator numbers and waste identification numbers, construction permits, construction stormwater pollution prevention plans, and authorizations to access privately-operated areas.

6. Final Site Remediation and Close-out:

If geologic media are contaminated above acceptable human-health-based levels, a Corrective Action Plan (CAP) must be implemented according to TNRCC guidelines. The Environmental Consultant should design the CAP and assist the Town with selection of contractors to implement the CAP. Remediation could involve over-excavation and disposal of waste soils, in situ or ex situ treatment of soils, groundwater treatment, soil vapor extraction, installation of barriers, etc. Excavated soils that are not impacted by hydrocarbons can be used for backfill; otherwise, clean soils must be brought from a borrow source for backfilling. Soils unsuitable as backfill, either because of poor geotechnical properties or contamination, must be disposed properly. Contaminated soils will be tested to determine contaminant levels, which will then define the type of disposal facility that is suitable. In some situations, contaminated soils may be subjected to a treatment process, such as bio-remediation or thermal desorption, if it appears cost effective or is necessary because of Federal Land Disposal Restrictions. Waste fuels, i.e. fuels unsuitable for use in aircraft, must be disposed properly. Tank sediments and emulsions, consisting of corrosion byproducts, water, soil particles, and other detritus, must also be disposed properly. Construction

equipment wash water, contaminated personal protective equipment, sampling devices, and all other waste produced as part of the abandonment/removal activities must be properly characterized and disposed. For either abandonment/removal or remediation activities, soil, water, and waste must be analyzed for hydrocarbons in order to properly characterize and categorize them. Analytical test methods will be those approved by the U.S. EPA and TNRCC. The Environmental Consultant should define the analytical program and conduct the testing with a National Environmental Laboratory Accreditation Program approved lab or other lab that can demonstrate participation in an auditing program administered by a regulatory agency or nationally-recognized standards organization. With assistance from the contractor(s), the Environmental Consultant will prepare the project closeout and as-built drawings, which will be coordinated with TNRCC, as required.

7. Scope of Work:

The Environmental Consultant will perform the underground fuel storage tank environmental baseline survey and investigation, as outlined in section 3, performing soil/gas analysis on a forty foot (40') grid at all UST locations. Using information gained or developed in this survey and investigation, the Environmental Consultant will, as outlined in sections 4 and 5, develop a detailed UST Removal/Compliance/Remediation plan in two parts. Part A will be the UST Removal Plan, Proposed Schedule and Documentation for Texas Natural Resource Conservation Commission approval and Part B will be the UST Removal Plan and Specifications, for competitive bid or negotiation with qualified UST removal contractors. For the identified USTs at Addison Airport, the estimated cost of removal and replacement with clean backfill, by a qualified contractor, is $170,000. Performing the UST Environmental Baseline Survey and Investigation as outline above is estimated at $33,500 and producing the UST Removal Plan, with Part A and B, is estimated at $14,500. UST removal management, testing, site evaluation, engineering and remediation requirements, and site close-out are not included in these estimated costs and are not reasonable to estimate until the UST baseline survey and investigation is complete.

Respectfully submitted to the Airport and Town of Addison, on May 10, 2001.

Samuel G. Lundgren, P.E.
Project Manager, Airport Services
Washington Infrastructure

Appendix 1
Cost Estimates For Addison Airport
Addison, Texas

Bulk Fuel Storage and Dispensing Facility

Construction Estimate:	Site work, pavement and utilities	$ 265,000
	Containment Structure and Pad	$ 250,000
	Storage tanks and piping	$1,500,000
	Controls and Equipment	$ 550,000
	Cover and structure	$ 95,000
	Contingency (5%)	$ 140,000
	Total	$2,800,000
Design Estimate:	Site Investigation & Survey	$ 12,500
	Architectural Design	$ 9,500
	Civil & Structural Design	$ 25,500
	Mechanical/Electrical Design	$189,000
	NEPA Documents	$ 3,500
	Bid Documents & Support	$ 8,500
	Total	$248,500

Underground Fuel Storage Tank Removal

Construction Estimate:	UST excavation & removal	$116,000
	Clean backfill & haul	$ 30,000
	Miscellaneous (permits, barricades)	$ 7,000
	Contingencies (10%)	$ 17,000
	Total	$170,000
Removal Design:	Investigation Studies	$ 9,500
	Soil/Gas	$ 24,000
	Plan & Specification Preparation	$ 14,500
	Total	$48,000

IAI No. &Project No.&
AIP No. &AIP No.&

CONTRACT

Addison Airport, as owned by the Town of Addison, TX, hereinafter called the "Sponsor", agrees to retain the Washington Infrastructure Services, Inc., hereinafter called the "Engineer", to perform the scope of engineering services as outlined below, hereinafter called the "Project" at Addison Airport, (AIP Project No). The term of this Contract shall become effective upon execution by the Parties and will remain in effect until _____ or as terminated in accordance with Paragraph XII below.

I. The scope of work contemplated under this agreement with regard to the Project is for engineering services for improvements to Addison Airport. Said improvements will include, but are not limited to, the following items:

List items and scope

II. Engineer's services for the above described scope of work will be provided in accordance with mutually agreed amendments issued pursuant to Paragraph III of this contract for the services described in the following schedule:

PART A - BASIC SERVICES (PRE-APPLICATION AND DESIGN/ENGINEERING)

1. As requested, assist the Sponsor in the preparation of the Pre-application for Federal Assistance (Capital Improvement Program). Prepare the Program Sketch, Program Narrative, and Engineer's Estimate and assist the Sponsor with the required Statements and Notifications, the Environmental Documentation, and the State and Regional reviews as required;

2. Consult/Coordinate with Airport Users, FAA, Airport Staff, Town, County, and other interested parties;

3. Review, and revise as necessary, the airport drawings which provide the basis for the project design;

4. Prepare preliminary plans, specifications, contract documents, and cost estimates for the design.

5. Provide acceptable Airport Layout Plan, Exhibit I and associated drawings, as required;

6. Prepare and submit final plans, specifications, and contract documents for approval by the Sponsor and the FAA prior to advertising for bids;

7. Prepare a Design Engineer's Report, including estimates of final quantities and opinion of probable construction costs. The report will be submitted with the final plans and specifications to the Sponsor and the FAA;

8. Prepare or assist in the preparation of the Application for Federal Funds and the Property Map (Exhibit "A");

9. Coordinate the establishment of bid proposals into schedules to allow flexibility of award to match the funds available;

10. Provide complete sets of approved plans, specifications, and contract documents for the bidding of the project;

11. Arrange for and conduct Pre-bid Conference and job showing;

12. Assist with the bid opening and processing of bid documents, and make recommendations to the Sponsor for award of contract schedules;

13. Perform miscellaneous engineering services, e.g. hydrology studies, as requested by airport management.

PART B - SPECIAL SERVICES (SOILS AND PAVEMENT INVESTIGATIONS/ TOPOGRAPHIC SURVEYS/FIELD ENGINEERING)

1. SOILS AND PAVEMENT INVESTIGATIONS (FOR DESIGN)

Perform soils and/or pavement testing and investigation of proposed construction areas as required for design.

2. TOPOGRAPHIC SURVEYS (FOR DESIGN)

Perform topographic surveys of proposed construction areas as required for design.

3. CONSTRUCTION ADMINISTRATION

Administer proposed construction activity.

4. FIELD ENGINEERING

Arrange for and conduct Pre-Construction Conference. Provide complete resident engineering coordination of the construction work with sufficient qualified inspectors who shall be present during all construction operations, to observe that construction is accomplished in accordance with the plans and specifications. It is expressly understood that the term "engineering coordination" does not mean that the Engineer will assume any responsibility that usurps or replaces the duties and authority of a Construction Superintendent or other Contractor agent charged with responsibility for the construction operation including but not limited to ways or means of construction or job site safety. The Engineer, in carrying out his responsibilities for

engineering coordination shall endeavor to guard the Sponsor against defects and deficiencies in the permanent work constructed by the Contractor, but does not guarantee the performance of the Contractor. The above disclaimers do not in any way abrogate the responsibility of the Engineer as agent for the Sponsor to exercise technical competence, expertise, skill and engineering judgment so that the Contractor's construction products are provided in accordance with the construction contract documents. The Engineer shall issue such instructions to the Contractor's Construction Superintendent as are necessary to protect the Sponsor's interests to the same extent as would the Sponsor himself, if he were present and equipped with the requisite knowledge, skill, competence, expertise, and engineering judgment.

The Engineer shall provide sufficient surveys and observe and check surveys conducted by the Contractor in accordance with the plans and specifications.

The Engineer shall conduct materials tests required by the FAA and/or observe and evaluate all such tests made by the Contractor in the field and in the laboratory as necessary in accordance with the plans and specifications. Copies of all test reports will be furnished to the Sponsor and the FAA. Test results will be available on the day tests are taken.

The Engineer shall act as the Sponsor's agent during construction to protect the Sponsor's interest and shall have the authority to recommend to the Sponsor that the construction be stopped if not in accordance with the plans and specifications. The Engineer will furnish the Sponsor and the FAA a weekly construction progress and inspection report.

The Engineer shall prepare all addition and deletion change orders and supplemental agreements as required. After acceptance of the Construction Contract by the Contractor, copies will be submitted to the Sponsor and the FAA for approval and signature before proceeding with the work.

The Engineer shall prepare periodic estimates during the construction of the project and shall prepare the final estimate when the work is completed. Periodic estimates shall be submitted regularly to the Sponsor for concurrence and submittal to FAA for Federal participation payment requests.

The Engineer shall review the submitted weekly contractor's payrolls, check shop drawings and construction submittals; and prepare and maintain necessary records of construction progress.

When the project has been completed and is ready for final acceptance, the Engineer shall arrange for inspection of the finished work by the FAA, the Sponsor, the Contractor, and the Engineer, following which the final estimate for the work will be considered by the Sponsor.

Upon acceptance of the project, the Engineer shall prepare the "Record Drawings," including any field surveying required to compute final quantities, and the Construction Engineering Report, and shall provide the Sponsor and the FAA with one (1) set of reproducible "Record Drawings," one microfiche copy, and one (1) copy of the Construction Report.

On completion of the project, the Engineer shall prepare and supply the Sponsor with an Airport Maintenance Program for the improvements constructed under the Project.

III. COMPENSATION

Engineer services to be performed under this contract will be ordered as required by the Sponsor via execution of mutually agreed amendments.

Compensation for services shall be on a Lump Sum or Cost Reimbursable basis as mutually agreed by the parties. The amendments issued under this Contract shall specifically identify the services, the type of Compensation, the applicable rates and the reimbursable expenses.

For performance of the Work described in each Lump Sum amendment, Sponsor shall pay the Lump Sum set forth in such amendment in monthly increments over the period of performance of the Work, based on percentage completed unless other specific payment schedules are mutually agreed to and set forth in the amendment.

For performance of the Work described in each Cost Reimbursable amendment, Sponsor shall pay Engineer the rates for the applicable individual performing the services times the number of hours employed on a specific project. The rates are identified on Attachment A, Established Hourly Rate Schedule and hereby incorporated. The rates set forth in Attachment A are subject to annual revision by the Engineer.

Expenses for Lump Sum and Cost Reimbursable projects shall be reimbursed by Sponsor as identified in the amendment.

Payments for all services shall be due within thirty (30) days after receipt of invoices. If Sponsor disputes any portion of an invoice, it shall not be relieved of the responsibility of paying the undisputed portion thereof.

IV. CHANGE OF SCOPE

It is mutually agreed that any change in the scope of the Project as outlined in Article I, or the services outlined in Article II, in Parts A and B, and/or delays (including completion of the work in more than one project) by the Sponsor, resulting in extra expense to the Engineer, shall be considered beyond the normal scope of this contract. In addition to the foregoing services, the Sponsor may require additional services such as Property Surveys, Descriptions of Land, Easements, Redesign or Major Changes of the concept after final plans or concepts have been approved by the FAA. Payment to the Engineer for such work because of the change in scope of the project shall be negotiated at the time of the anticipated change and it shall be mutually agreed to by amending this contract.

V. The Engineer further agrees that:

1. The Sponsor, the Federal Aviation Administration, and the Comptroller General of the United States or any of their designated representatives shall have access to any books, documents,

papers and records of the Engineer which are directly pertinent to the grant program for the purpose of making audit examination, excerpts, and transcriptions.

2. The Engineer has formulated, adopted, and actively maintains an affirmative action plan in compliance with Executive Order No. 11246 entitled, "Equal Employment Opportunity." The Engineer does not discriminate on the basis of race, color, religion, creed, national origin, sex, or age. Goals and targets are specified in the affirmative action plan to assure its implementation.

3. All services performed shall be in conformance with any and all applicable rules and regulations of the Federal Aviation Administration.

4. Whereas, it is the policy of the Department of Transportation (DOT) that Disadvantaged Business Enterprises as defined in 49 CFR Part 26 shall have the maximum opportunity to participate in the performance of contracts financed in whole or in part with Federal funds, consequently, the DBE requirements of 49 CFR Part 26 apply to this contract.

   The Engineer shall agree to ensure that Disadvantaged Business Enterprises as defined in 49 CFR Part 26 have the maximum opportunity to participate in the performance of contracts and subcontracts financed in whole or in part with Federal funds. In this regard, all Contractors shall take all necessary and reasonable steps in accordance with 49 CFR Part 26 to ensure that Disadvantaged Business Enterprises have the maximum opportunity to compete for and perform contracts. Contractors shall not discriminate on the basis of race, color, national origin, or sex in the award and performance of DOT assisted contracts.

VI. The Engineer and the Sponsor mutually agree that:

1. The Sponsor and the Engineer each binds himself, his partners, successors, assigns, and legal representatives to the other party to this contract and the partners, successors, assigns and legal representatives of such other party in respect of all covenants of this contract. Neither the Sponsor nor the Engineer shall assign, sublet, or transfer its interest in this contract without the written consent of the other;

2. The original plans and specifications shall remain the property of the Engineer; however, the Sponsor will be provided one (1) set of specifications and reproducible plans whether or not the project is executed. With the Engineer's prior consent, the Sponsor may use those plans in any manner he wishes, provided the Sponsor agrees to save and hold the Engineer harmless for any liability resulting from such reuse.

VII. The Sponsor agrees that:

1. The Sponsor shall make available to the Engineer all technical data that is in the Sponsor's possession including maps, surveys, property descriptions, borings and other information required by the Engineer and relating to his work.

2. The Sponsor agrees to cooperate with the Engineer in the approval of all plans and specifications, or should they disapprove of any part of said plans and specifications, shall make

a timely decision in order that no undue expense will be caused the Engineer because of lack of decisions. If the Engineer is caused to incur other expenses such as extra drafting, due to changes ordered by the Sponsor after completion and approval of the plans and specifications, the Engineer shall be equitably paid for such extra expenses and services involved.

3. The Sponsor shall pay publishing costs for advertisements of notices, public hearings, requests for bids, and other similar items; shall pay for all permits and licenses that may be required by local, state or federal authorities; and shall secure the necessary land, easements, and rights-of way required for the project.

VIII. INSURANCE

The Engineer shall procure and maintain at its expense during the effective period of this Contract the following insurance from insurance companies authorized to do business in Colorado covering all operations and services under this Contract performed by Engineer.

Workers' Compensation Insurance in accordance with the provisions of the Colorado Workers' Compensation Act.

Commercial General Liability in amounts not less than $1 million combined single limit per occurrence and $1 million aggregate for bodily injury, personal injury and property damage with endorsements to include broad form contractual, and broad form property damage.

Automobile Liability, Bodily Injury and Property Damage with a limit of $1 Million for occurrence, combined single limit including owned, hired and non-owned autos.

Professional Liability Insurance in amounts not less than $1 million per claim and annual aggregate.

The Engineer shall furnish to the Sponsor a certificate or certificates of insurance showing compliance with this paragraph. The certificates shall provide that the insurance shall not be canceled until ten (10) days written notice shall have been given to Sponsor.

IX. WARRANTY

Engineer warrants that the services performed hereunder beginning on the date Engineer completes Work and terminating one year from the completion thereof, will be in accordance with that degree of care and skill ordinarily exercised by members of the engineering profession existing as of the date that such services are performed. Engineer's sole liability to Sponsor for any non-conforming Work shall be to correct the item of defective Work, written notice of which must be promptly given by Sponsor to Engineer.

The only warranties made by Engineer are those expressly enumerated in this provision. Any other statements of fact or descriptions expressed in the contract or any attachments thereto shall not be deemed to constitute a warranty of the Work or any part thereof. THE WARRANTIES

SET FORTH IN THIS PROVISION ARE EXCLUSIVE AND IN LIEU OF ALL OTHER WARRANTIES, WHETHER STATUTORY, EXPRESS OR IMPLIED (INCLUDING ALL WARRANTIES OF MERCHANTABILITY AND FITNESS FOR PARTICULAR PURPOSE AND ALL WARRANTIES ARISING FROM COURSE OF DEALING AND USAGE OF TRADE).

The remedies provided above are the Sponsor's sole remedies for any failure of Engineer to comply with its obligations. Correction of any nonconformity or reimbursement to Sponsor in the manner and for the period of time provided above shall constitute complete fulfillment of all the liabilities of Engineer for defective or nonconforming services or materials whether the claims of the Sponsor are based in contract, in tort (including negligence and strict liability), or otherwise with respect to or arising out of the work performed hereunder.

X. CONSTRUCTION COST OPINION

An opinion of probable construction cost prepared by the Engineer represents his judgment as a design professional and is supplied for Sponsor's guidance. Since the Engineer has no control over the cost of labor and material, or over competitive bidding or market conditions, the Engineer does not guarantee the accuracy of its opinion as compared to contractor bids or actual cost to the Sponsor.

XI. FORCE MAJEURE

Any delay or failure of Engineer in the performance of its required obligations hereunder shall be excused if and to the extent caused by acts of God, war, riot, strike, fire, storm, flood, windstorm, discovery or uncovering of hazardous or toxic materials or causes beyond the reasonable control of Engineer, provided that prompt written notice of such delay or suspension be given by Engineer to the Sponsor. Upon receipt of said notice, if necessary, the time for performing shall be extended for a period of time reasonably necessary to overcome the effect of such delays and Engineer shall be reimbursed for the cost of such delays.

XII. TERMINATION

A. Upon five-(5) business days written notice to Engineer, Sponsor may terminate Engineer's right to proceed further with the Work under this Contract or any amendment issued hereunder. In the event of such termination, Sponsor may take possession of the Work in such manner as Sponsor may deem expedient, but Engineer shall not be liable to Sponsor for any excess cost of completion, nor shall Engineer be liable to Sponsor for damages of any nature for delays in the completion of the Work. In the event of such termination of Engineer's right to further proceed with the Work, Sponsor shall reimburse Engineer for all costs associated with the cessation of Engineer's services, plus that portion of the Contract Price earned to the date of such termination, and Sponsor shall thereafter assume all obligations, commitments, or other liabilities that Engineer shall have theretofore incurred or made in connection with its performance of the Work and for which Engineer has not been paid and released.

B. If, notwithstanding the provisions of Paragraph XI, the Work shall be delayed for more than 30 calendar days on account of one or more of the occurrences set forth in Paragraph XI, or if

Sponsor shall fail to pay Engineer in accordance with the Payment Schedule, Engineer may, at its option, upon five (5) business days written notice to Sponsor, terminate this Contract. In the event of such termination, Sponsor shall reimburse Engineer for all costs of performance of the Work as Engineer may have incurred on account of such delays. Sponsor shall thereafter assume all obligations, commitments, or other liabilities that Engineer shall have theretofore incurred or made in connection with its performance of the Work and for which Engineer has not been paid and released.

C. Either party hereto may terminate this Contract by giving the other party thirty (30) calendar days written notice of its intent to terminate. Upon termination, Engineer shall be entitled to payment in accordance with subparagraph A of this Paragraph XII.

XIII. LIABILITY

Each party will defend and indemnify and hold harmless the other party from and against liability, damage, loss, costs and expenses, including attorney's fees, on account of injury or damage to persons or property occurring on or occasioned by facilities owned or controlled by such indemnifying party, unless such injury or damage resulted from the sole negligence of the other party. In the event negligence is attributable to both parties, each party shall be responsible for the resulting damages attributable to the negligence of such party whether such proportionate share is arrived at through agreement between the parties or as a result of litigation.

Whether due to delay, breach of contract, warranty, tort (including negligence and strict liability) or any other theories of liability, neither Engineer nor its contractors or suppliers of any tier shall be liable for any special, indirect, incidental or consequential damages of any nature, including, without limitation, Sponsor's loss of actual or anticipated profits or revenues, loss by reason of shutdown, non-operation, or increased expense of manufacturing or operation, loss of use, cost of capital, damage to or loss of property or equipment of Sponsor or claims of customers of the Sponsor.

The remedies stated in the contract are exclusive and in no event shall the liability of Engineer or its contractors or suppliers of any tier to Sponsor, for the order under which the liability arose, whether in contract, warranty, tort (including negligence or strict liability) or otherwise for the performance or breach of the contract or anything done in connection therewith exceed an amount equal to one hundred percent (100%) of the value of the contract.

XIV. DISPUTES

Any dispute which shall arise as to the obligation of either party under the contract or the interpretation of any provision thereof, if not settled by agreement of the parties, shall be settled by arbitration in a [mutually agreed city] in the United States of America, in the English language, under the commercial rules then established by the American Arbitration Association, and judgment upon any arbitration award may be entered in any court having jurisdiction thereof.

XV. SEVERABILITY

The provisions of this Contract are severable, and, if any provision shall be determined to be illegal or unenforceable, such determination shall in no manner affect any other provision hereof, and the remainder of this Contract shall remain in full force and effect, provided however, that the intention and essence of this contract may still be accomplished and satisfied. In the event that any provision of the Contract is held to be unenforceable or invalid by any court of competent jurisdiction, Engineer and Sponsor shall negotiate an equitable adjustment in the provisions of this Contract to preserve the purpose of this contract and maintain the allocation or risk, liabilities and obligations originally agreed upon.

XVI. GOVERNING LAW

The terms of this Agreement shall be construed and interpreted under, and all respective rights and duties of the parties shall be governed by, the laws of the State of Colorado.

XVII. ENTIRE AGREEMENT

This Contract constitutes the entire agreement between the parties and the terms and conditions hereof were negotiated between the parties on an arms-length basis and no obligation or covenant of good faith or fair dealing shall be implied or interpreted as conferring upon either party any right, duty, obligation or benefit other than expressly set forth herein. No modifications or amendments to this Contract shall be valid unless agreed to by the parties in writing and signed by their authorized representatives.

IN WITNESS WHEREOF, the parties hereto have affixed their signatures this ___ day of _____, 2001.

SPONSOR:
Town of Addison
Addison, TX

ATTEST:

By _____
Town Manager

_____
Town Attorney

ENGINEER:
Washington Infrastructure Services, Inc.

By _____

Draft - Basic Airport Services Contract
Amendment #1
Project: Environmental Baseline Investigation and Underground Fuel Storage Tank Removal Plan

Amendment #2
Project: New Bulk Fuel Storage and Dispensing Facility