

In Reply Refer To: MS 5231

September 10, 1992

Hall-Houston Oil Company
Attention: Ms. Kathy Camp
700 Louisiana, Suite 2100
Houston, Texas 77002

Gentlemen:

Reference is made to the following plan received August 27, 1992:

Type Plan - Supplemental Development Operations Coordination Document
Lease - OCS-G 5993
Block - 781
Area - Mustang Island
Activities Proposed - Platform A and Wells A-3 and A-4

In accordance with 30 CFR 250.34, this plan is hereby deemed submitted and is now being considered for approval.

Your control number is S-2817 and should be referenced in your communication and correspondence concerning this plan.

Sincerely,

(Orig. Sgd.) A. Donald Ginnir

For

D. J. Bourgeois
Regional Supervisor
Field Operations

bcc: Lease OCS-G 5993 POD File (MS 5032)
MS 5034 w/public info. copy of the plan
and accomp. info.

AGobert:cic:09/01/92:DOCDGOM

NOTED - SCHEXNAILDRE

Office of
Program Services
SEP 15 1992
Information Services
Section

HALL-HOUSTON OIL COMPANY

700 Louisiana, Suite 2100/Houston, Texas 77002



Telephone
(713) 226-0711
Fax
(713) 225-7600
(713) 225-7601

August 21, 1992

Mr. Daniel J. Bourgeois
Regional Supervisor, Field Operations
U.S. Department of the Interior
Minerals Management Service
1201 Elmwood Park Boulevard
New Orleans, Louisiana 70123-2394

Attention: MS 5231

RE: Supplemental Development Operations Coordination Document
OCS-G 5993, Block 781
Mustang Island Area
Offshore Texas

Gentlemen:

Enclosed please find nine (9) copies of the Supplemental Development Operations Coordination Document (DOCD) with Air Quality Review for Lease OCS-G 5993, Mustang Island Block 781. Five (5) copies of the subject report are for "Proprietary" information purposes and four (4) copies contain "Public Information"; all copies being marked accordingly.

Excluded from the Public Information copies are certain geologic discussions, depth of wells and structure map.

Hall-Houston Oil Company anticipates commencing drilling operations October 1, 1992.

Should further information be required, please contact the undersigned.

Sincerely,

Handwritten signature of Kathy Camp in cursive.

Kathy Camp
Regulatory & Environmental Manager

KC:ba
enclosures

mj7E1s.doc

Public Information

SUPPLEMENTAL DEVELOPMENT OPERATIONS COORDINATION DOCUMENT

MUSTANG ISLAND AREA, BLOCK 781

OCS-G 5993

Hall-Houston Oil Company (Hall-Houston) as Operator of the subject block, submits this proposed Supplemental Development Operations Coordination Document (DOCD) in accordance with the regulations contained within Title 30 CFR 250.34, as follows:

1. Brief History to Date

Under an Initial DOCD, Hall-Houston Oil Company installed Platform A in Mustang Island 781 to produce Wells A-1 and A-2.

On March 23, 1992, the "A" platform and production facility was struck by a cargo freighter and severely damaged. Hall-Houston plugged and abandoned the producible wells A-1 and A-2 on July 24, 1992 and will remove the damaged structure as soon as possible.

Lease OCS-G 5993 is currently held by operations through October 22, 1992.

2. Description and Schedule of Operations

A total of two (2) wells will be involved in the additional development and production activities for Mustang Island Area Block 781.

Under this Supplemental DOCD, Hall-Houston Oil Company is proposing to re-install a duplicate 4-pile platform (to be designated "A"), with production facility approximately 130' south from the original surface location and drill two wells (A-3 & A-4) to replace Wells A-1 and A-2. Hall-Houston will re-connect and modify the existing pipeline right-of-way OCS-G 9339.

The following schedule details the chronological order of the proposed events leading to full production:

<u>Activity</u>	<u>Approximate Date</u>
1) Install jacket & drill Wells A-3 & A-4	October 1, 1992
2) Re-connect pipeline	October 15, 1992
3) Hook-up & commence production	December 15, 1992

3. Drilling/Completion Equipment

The proposed wells will be drilled and completed with a jackup drilling rig. When a rig is selected, the rig specs will be made a part of the applications for Permit to Drill. Typical diverter and BOP schematics are enclosed herewith as Attachment II. Any rig utilized by Hall-Houston Oil Company will be designed, operated and maintained in accordance with 30 CFR 250.40 (b) (4).

Pollution prevention features will include a drill floor containment system with collection tank in hull.

Safety features will include well control and blowout prevention equipment as described in 30 CFR 250, Subpart D. Hall-Houston will perform all operations in a safe and workmanlike manner and will maintain all equipment in a safe condition, thereby ensuring the protection of lease and associated facilities, the health and safety of all persons, and the preservation and conservation of property and the environment. The appropriate life rafts, life jackets, ring buoys, etc., as prescribed by the U.S. Coast Guard, will be maintained on the facility at all times.

4. Platform and Production Equipment

Platform "A" shall be designed, fabricated, installed, inspected, and maintained in accordance with all the requirements of 30 CFR 150.130 (b), under the provisions of the "Requirements for Verifying the Structural Integrity of OCS Platforms".

Pollution prevention features will include the installation of curbs, gutters, drip pans, and drains in deck areas in a manner necessary to collect all contaminants not authorized for discharge. Oil drainage will be piped to a properly designed, operated, and maintained sump system which will automatically maintain the oil at a level sufficient to prevent discharge of oil into offshore waters. All gravity drains shall be equipped with a water trap or other means to prevent gas in the sump system from escaping through the drains. Sump piles shall not be used as processing devices to treat or skim liquids but may be used to collect treated-produced water, treated-produced sand, or liquids from drip pans and deck drains and as a final trap for hydrocarbon liquids in the event of equipment upsets. Improperly designed, operated or maintained sump piles which do not

prevent the discharge of oil into offshore waters shall be replaced or repaired.

Production safety equipment shall be designed, installed, used, maintained, and tested in a manner to assure the safety and protection of the human, marine, and coastal environments in accordance with 30 CFR 250 Subpart H. Hall-Houston Oil Company will perform all installation and production operations in a safe and workmanlike manner, and will maintain all equipment in a safe condition, thereby ensuring the protection of lease and associated facilities, the health and safety of all persons, and the preservation and conservation of property and the environment. The appropriate life rafts, life jackets, ring buoys, etc., as prescribed by the U.S. Coast Guard, will be maintained on the facility at all times.

All platform production facilities shall be protected with a basic and ancillary surface safety system designed, analyzed, installed, tested, and maintained in operating condition in accordance with the provisions of API RP 14C, Recommended Practice for Analysis, Design, Installation and Testing of Basic Surface Safety Systems for Offshore Production Platforms.

Platform "A" will be identified and reported in accordance with the requirements of the U.S. Coast Guard.

5. Location of Wells

The location of the proposed wells are as follows:

		<u>TOTAL DEPTH</u>
A-3	SL: 370' FWL & 1595' FSL	
A-4	SL: 370' FWL & 1595' FSL	

Mustang Island Block 781 is located approximately 15 miles south of Port Aransas, Texas. The water depth at the "A" platform is 130 feet. See Attachment III, for the location of the structure and proposed wells.

Public Information

6. Onshore Facilities and Transportation

The service base for this area will be located in Galveston, Texas. This is an established facility that will require no modifications. Transportation from the existing onshore facilities to the block will involve the use of one supply boat making seven (7) trips per week, one crew boat making ten (10) trips per week and one helicopter making one (1) trip per week during drilling/completion operations. It is estimated one service boat will be making seven (7) trips per week during production operations with one helicopter making two (2) trips per week.

Enclosed herewith as Attachment IV, is a map showing the lease relative to the shoreline depicting the proposed transportation route(s). The boats will normally move to Block 781 via the most direct route from Galveston, Texas. The helicopter will normally take the most direct route of travel between the two points when air traffic and weather conditions permit.

7. Geological/Geophysical Information

Information on geological hazards and surface locations relative to anomalies was included in the Initial Plan of Exploration and DOCD for Block 781. Since the proposed location is 130' from the previous platform location, Hall-Houston does not anticipate any problems with the re-installation of a platform at this location.

A structure map which illustrates Hall-Houston's current interpretation of Mustang Island Block 781 is enclosed herewith as Attachment V.

The estimated life of reserves for Block 781 is . years with production estimated at MMCFPD and BOPD.

8. Pollution Prevention Information

All drilling, completion and production operations shall be performed in accordance with industry standards to prevent pollution of the environment. Hall-Houston's Oil Spill Contingency Plan has been approved by the MMS. This plan designates an Oil Spill Team consisting of Hall-Houston's personnel and contract personnel. This team's duties are to eliminate the source of any spill, remove all sources of possible ignition, deploy the most reliable means of available

HALL-HOUSTON OIL COMPANY
Supplemental DOCD
Mustang Island 781

transportation to monitor the movement of a slick, and contain and remove the slick, if possible.

Hall-Houston is a member of Clean Gulf Associates (CGA). The CGA has two permanent equipment bases in Texas, at Port Aransas and Galveston, and four bases in Louisiana, at Venice, Grand Isle, Intracoastal City, and Cameron. Each base is equipped with fast response skimmers and there is a barge mounted high volume open sea skimmer based at Grand Isle, Louisiana. In addition to providing equipment, the CGA also supplies advisors for clean-up operations. Equipment available from CGA and the base it is located at is listed in the CGA Manual, Volume I, Section III and on quarterly equipment update reports for each base.

Estimated response time for a spill in Mustang Island Block 781 during normal weather conditions could vary from 6 to 8 hours based on the following:

	<u>Hours</u>
1. Procurement of boat capable of handling oil spill containment equipment and deployment to nearest CGA Base in Port Aransas, Texas	2.0-4.0
2. Load out of Fast Response Unit:	2.0
3. Travel to lease site from CGA Base	
(6 miles at 8 MPH inland waters)	1.0
(9 miles at 10 MPH open waters)	<u>1.0</u>
Estimated Total Time	6.0 - 8.0

Equipment located at Port Aransas, Texas would be utilized first with additional equipment transported from the nearest equipment base on-site as required.

The chances of having an oil spill from the proposed drilling/completion operations will be remote. Well tests performed upon completion indicate no condensate being produced. However, in the event a spill occurs our company has projected the probability of a spill utilizing information in the Environmental Impact Statement (EIS) for OCS Lease Sales 139, and 141.

HALL-HOUSTON OIL COMPANY
Supplemental DOCD
Mustang Island 781

The EIS contains oil spill trajectory simulations using seasonal surface currents coupled with wind data, adjusted every 3 hours for 30 days or until a target is contacted.

Hypothetical spill trajectories were simulated for each of the potential launch sites across the entire Gulf. These simulations presume 500 spills occurring in each of the four seasons of the year. The results in the EIS were presented as probabilities that an oil spill beginning from a particular launch site would contact a certain land segment within 3, 10, or 30 days. Utilizing the summary of the trajectory analysis (for 10 days) as presented on pages IV-112 through IV-114, the probable projected land fall of an oil spill from the referenced block is as follows. Also listed is the CGA Map Number corresponding to the land segment which will be utilized to determine environmentally sensitive areas that may be affected by a spill.

<u>AREA</u>	<u>LAND SEGMENT CONTACT</u>	<u>%</u>	<u>CGA MAP NO.</u>
MU 781	Kenedy, Tex.	2%	TX Map No.1
	Kleberg, Tex.	8%	TX Map No.1 & 2
	Nueces, Tex. et al.	17%	TX Map No.2
	Aransas, Tex.	22%	TX Map No.2
	Calhoun, Tex.	12%	TX Map No.2

Section V, Volume II of the CGA Manual containing maps as listed above, also includes equipment containment/cleanup protection response modes for the sensitive areas. Pollution response equipment available from CGA and its stockpile base is listed in the CGA Manual Volume I, Section III.

Section VI, Volume II of the CGA Operations Manual depicts the protection response modes that are applicable for oil spill clean-up operations. Each response mode is schematically represented to show optimum deployment and operation of the equipment in areas of environmental concern. Implementation of the suggested procedures assures the most effective use of the equipment and will result in reduced adverse impact of oil spills on the environment. Supervisory personnel have the option to modify the deployment and operation of equipment to more effectively respond to site-specific circumstances.

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Mustang Island 781

9. New or Unusual Technology

Hall-Houston Oil Company does not intend to utilize any new or unusual techniques or technology while developing Mustang Block 781.

10. Lease Stipulation(s)

Stipulation No. 1 - Cultural Resources Study

Information relative to anomalies was included in the Initial POE. This structure will be installed adjacent to a previously approved surface location.

Although there are no unidentified anomalies within 500 feet of the platform location, Hall-Houston Oil Company agrees that if any site, structure, or object of historical or archaeological significance should be discovered during any operation, the findings will be immediately reported to the Regional Director and every reasonable effort will be made to preserve and protect the cultural resource from damage until the Regional Director has given direction as to its preservation.

Stipulation No. 3 - Military Warning Area

Mustang Island Block 781 lies within the Military Warning Area W-228. In accordance with this stipulation, Hall-Houston Oil Company will contact the Naval Air Training Command, Naval Air Station, Corpus Christi, Texas, concerning the use of boats and aircraft in the referenced area prior to operations commencing.

11. Effluent Discharges

It is not expected that any liquid or solid wastes, or pollutants will be generated by offshore, onshore, or transportation-related operations with the following exceptions. The discharge of wastewater resulting from offshore activities includes deck drainage, solid wastes (i.e. sanitary and domestic wastes), cooling water and desalinization unit discharges. Deck drainage will consist of all waste resulting from rainfall, rig/platform washing, deck washings, tank cleaning operations, and runoff from curbs and gutters, including drip pans and work areas with an estimated volume range of 0 to 200 bbls/day. Sanitary and domestic wastes will be processed on the rig and the resulting

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Mustang Island 781

effluent will be discharged into the Gulf with an estimated maximum of 2900 gallons/day flow, depending on the number of inhabitants. Cooling water is defined by the U.S. Environmental Protection Agency as "noncontact" water used for cooling machinery, and desalinization discharges are those wastes resulting from the creation of freshwater from seawater. These discharges are regulated by the U.S. Environmental Protection Agency through the National Pollutant Discharge Elimination System (NPDES) Permit.

Drill cuttings and excess drilling fluids will be disposed of in accordance with applicable environmental regulations. Drilling fluids used by Hall-Houston Oil Company are composed of bulk constituents and special purpose additives. The principal bulk constituents are water, barite (barium sulfate), clay minerals, chrome lignosulfonate, lignite, and sodium hydroxide. All these constituents are nontoxic to marine organisms at the dilutions reached shortly after discharge. Attachment VI shows Anticipated Quantities of Discharges.

Hall-Houston Oil Company will utilize a water-based mud system during the continuous phase of the drilling mud. In special circumstances, especially in freeing stuck pipe, and oil "slug" or "pill" may be added to a water-based mud. Hall-Houston will not discharge oil-based mud or mud to which diesel has been added. Any oil contaminated muds or cuttings will be transported to shore for proper disposal. Where oil other than diesel is added to the mud system, it may be discharged as long as there is no visible sheen on the receiving waters and the mud meets the toxicity limitations imposed by the U.S. Environmental Protection Agency in the NPDES Permit. Attachment VII, Drilling Mud Components.

12. Hydrogen Sulfide

Based on the drilling and production of Wells A-1 & A-2 on Mustang Block 781, Hall-Houston Oil Company considers this area in which additional drilling and production operations are to be conducted as a zone or zones where the absence of hydrogen sulfide has been confirmed.

To the best of Hall-Houston's knowledge, there are no production records to indicate hydrogen sulfide has been produced from similar stratigraphic zones in this area.

In accordance with 30 CFR 250.67, Hall-Houston hereby requests

HALL-HOUSTON OIL COMPANY
Supplemental DOCD
Mustang Island 781

a determination be made by your office that our company will be drilling and producing in a zone where the absence of hydrogen sulfide has been confirmed.

13. Attachments

Enclosed are copies of the following information:

ATTACHMENT NO.

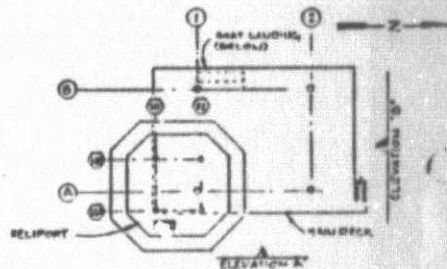
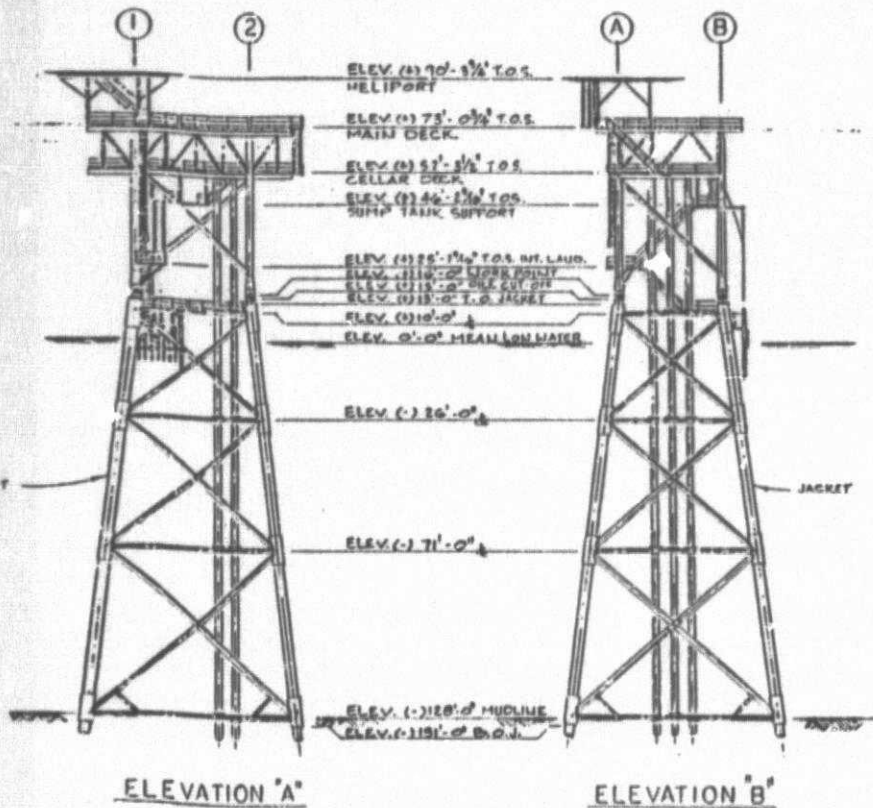
I	Platform Drawing
II	BOP & Diverter
III	Bathymetry Map
IV	Vicinity Map
V	Structure Map
VI	Quantity of Discharge
VII	Mud components

Also enclosed is the Air Quality review.

BEST AVAILABLE COPY

NOTE: There are 4 lights on each corner of the main deck.
cellar

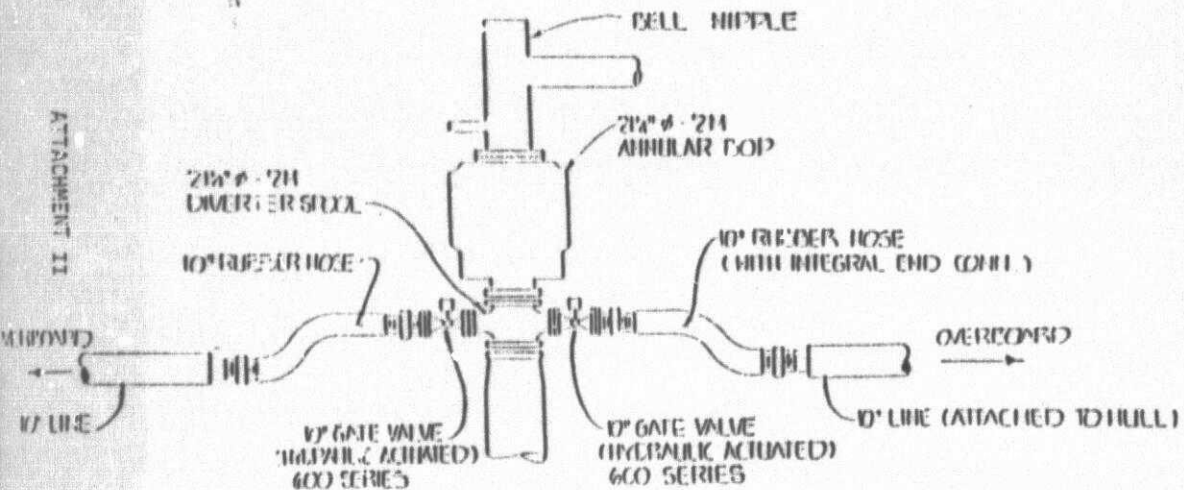
ATTACHMENT I



APPLICATION BY:	4 - PILE
HALL - HOUSTON OIL CO.	PRODUCTION PLATFORM
SIGNATURE	LEASE BLOCK 781
TITLE	DATE
	MUSTANG ISLAND

PREPARED BY: TECHNICAL ENGINEERING CONSULTANTS, INC.

44303



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TYPICAL DIVERTER

780 781

OCS-G 5993

HALL-HOUSTON OIL CO. (W/2)

FAIRWAY

FAIRWAY

Proposed Platform "A"

130' WD

370'

1595'

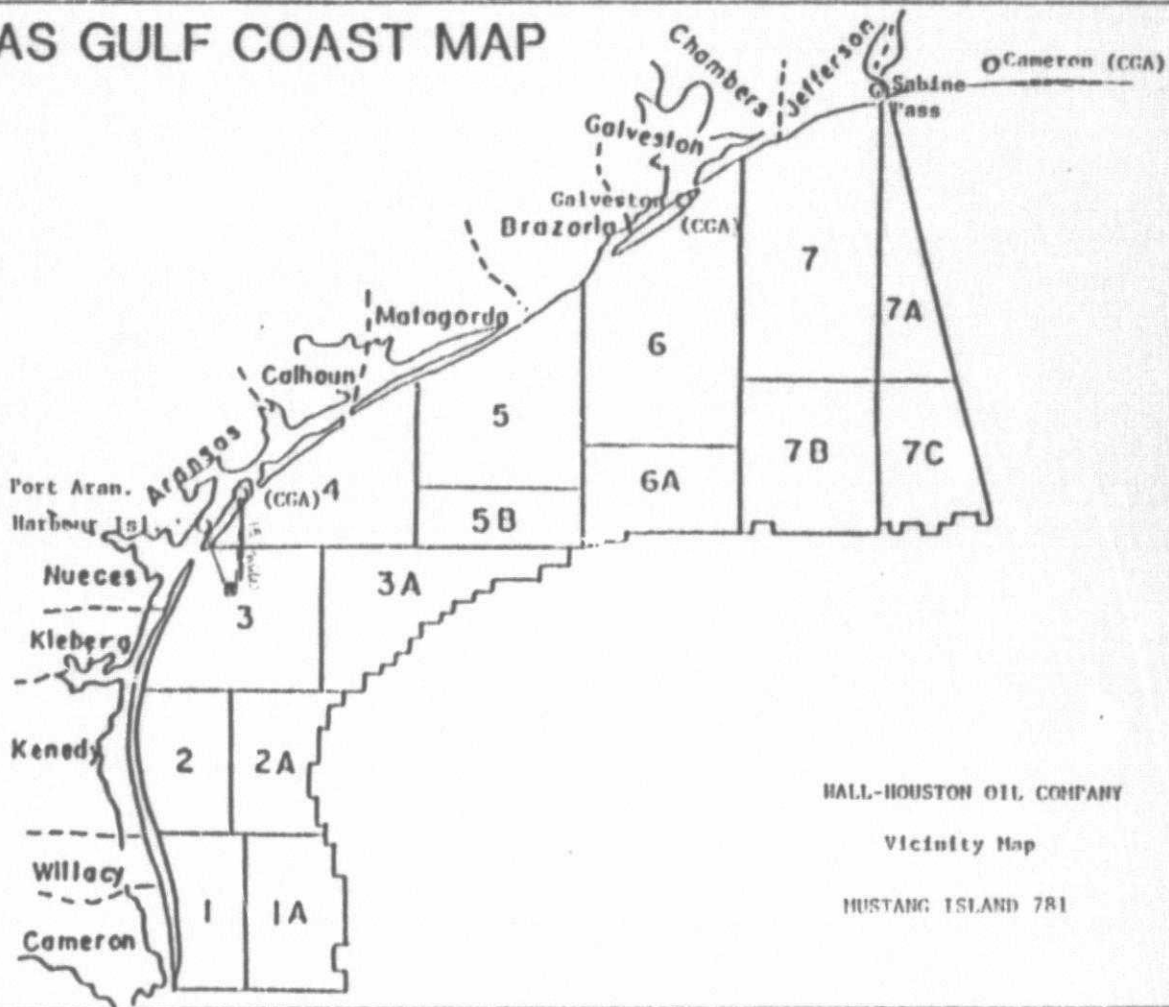
HALL - HOUSTON OIL CO.

MUSTANG ISLAND AREA

DEVELOPMENT OPERATIONS
COORDINATION DOCUMENT

0 2000' 4000'

TEXAS GULF COAST MAP



HALL-HOUSTON OIL COMPANY

Vicinity Map

MUSTANG ISLAND 781

ANTICIPATED QUANTITY OF DISCHARGED MUD, CUTTINGS & FLUIDS

Mustang Island 781
Wells A-1 & A-2

<u>Depth (TVD)</u>	<u>Hole Size</u>	<u>Quantity (bbls)</u>	<u>Discharge Rate</u>
	20"	272	MAX 1000 BPH
	13-1/2"	319	MAX 1000 BPH
	9-7/8"	<u>321</u>	MAX 1000 BPH
Total discharge per well		1074	

DRILLING MUD COMPONENTS

<u>COMMON CHEMICAL OR CHEMICAL TRADE NAME</u>	<u>DESCRIPTION OF MATERIAL</u>
Aluminum Stearate	Aluminum Stearate
"AXTAFLO-S"	Nonionic Surfactant
Barite	Barium Sulfate (BaSo4)
Calcium Carbonate	Aragonite (CaCo3)
Calcium Chloride	Hydrophilite (CaCl2)
Calcium Oxide	Lime (Quick)
Calcium Sulfate	Anhydrite (CaSO4)
Carboxymethyl Cellulose	Carboxymethyl Cellulose
Caustic Potash	Potassium Hydrate
Caustic Soda	Sodium Hydroxide (NaOH)
Chrome Lignite	Chrome Lignite
Chrome Lignosulfonate	Chrome Lignosulfonate
Drilling Detergent	Soap
"E-Pal"	Non-toxic, biodegradable defoamer
Ferrochrome Lignosulfonate	Derived from wood pulp
Gel	Sodium montmorillonite, bentonite, attapulgit
Gypsum	CaSo4.2H2O
Lignite	Lignite
Lignosulfonate	Lignosulfonate
"Mud Sweep"	Cement Pre-Flush
"MOR-REX"	Hydrolyzed Cereal solid
"Shale-Trol"	Organo-aluminum complex
Sapp	Sodium Acid Pyrophosphate
Soda Ash	Sodium Carbonate
Sodium Bicarbonate	NaHCO3
Sodium Carboxymethyl Cellulose	Sodium Carboxymethyl Cellulose
Sodium Chloride	NaCl
Sodium Chromate	NaCrO4.10H2O
Starch	Corn Starch
"TX-9010"	Biodegradable drilling lubricant
"TORC-Trim"	Biodegradable drilling lubricant
"Black Magic"	Oil Base mud conc.
"Black Magic Supermix"	Sacked concentrated oil base mud
Diesel	Used to mix certain loss-circula- tion pills
"Jelflake"	Plastic foil, shredded cellophane
MICA	Loss-circulation material
"Pipe-Lax"	Surfactant mixed with diesel
"Wall-Nut"	Ground walnut shells
Wood Fiber	Loss-circulation material

ATTACHMENT VII

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PROJECTED AIR EMISSIONS SCHEDULE
FOR PLAN OF EXPLORATION

GENERAL INFORMATION

Location: Mustang Island Area Block 781
OCS-G 5993
Distance Offshore: 15 miles
Type of Rig: Jackup
Operator: Hall-Houston Oil Company
700 Louisiana, Suite 2100
Houston, Texas 77002
Contact Person: Kathy Comp
Well Footage to be Drilled:
Date Drilling will begin: \

MAJOR SOURCE (OFFSHORE)

Power used aboard drilling vessel; approximate footage to be drilled 19,039'.*

<u>Emitted</u> <u>Substance</u>	<u>Projected Emissions</u> <u>** (Lbs/Day) Tons/yr</u>	
	<u>1992 - 1993</u>	
CO	(84)	3.00
SO ₂	(27)	1.00
NOx	(393)	12.00
VOC	(32)	1.00
TSP	(28)	1.00

* Based on 60 hphr/ft. from Table 4-3, "Atmospheric Emissions from Offshore Oil and Gas Development and Production", EPA No. 450/3-77-026, June 1977.

** Emission factors from Table 3.3.3-1, "Compilation of Air Pollutant Emission Factors", Third Edition, EPA Report AP-42, August, 1977

Projected Air Emissions
 Hall-Houston Oil Company
 Mustang Island Block 781
 Page two

MINOR SOURCES (OFFSHORE)*

<u>Emitted Substances</u>	<u>Projected Emissions (tons/year) 1992-1993</u>
CO	.10
SO ₂	---
NOx	.00
VOC	.00
TSP	.00

* Tables 3.2.2-3, 3.2.3-1 and 2.1-1, "Compilation of Air Pollutant Emission Factors", Third Edition, EPA Report AP-42, August, 1977.

TOTAL ALL SOURCES (tons/year)

<u>1992-1993</u>	<u>CO</u>	<u>SO₂</u>	<u>NOx</u>	<u>VOX</u>	<u>TSP</u>
Major	3.00	1.00	12.00	1.00	1.00
Minor	<u>.10</u>	<u>--</u>	<u>.00</u>	<u>.00</u>	<u>.00</u>
TOTAL	3.10	1.00	12.00	1.00	1.00

ONSHORE SOURCES

These should be about the same as minor sources unless new facilities are installed at the onshore base. No additional facilities are required or planned at this time.

EMISSION EXEMPTION DETERMINATION

For CO: $E = 3400^{2/3} = 3400 (15)^{2/3} = 20,679$ tons/year
 For NOx, VOC, TSP & SO₂: $E = 33.3 D = 33.3 (15) = .00$ tons/year

Projected Air Emissions
Hall-Houston Oil Company
Mustang Island Block 781
Page three

TRANSPORTATION SERVICES

Supply Boats (3000 hp)
Trips Per Week During Drilling - 7
Trips Per Week During Production - 7

Crew Boats
Trips Per Week During Drilling - 10

Helicopter
Trips Per Week During Drilling - 2
Trips Per Week During Production - 2

METHODOLOGY

Platform: Horsepower - hour method
Boats: Horsepower - hour method
Helicopters: Landing/Takeoff (LTO) cycle method

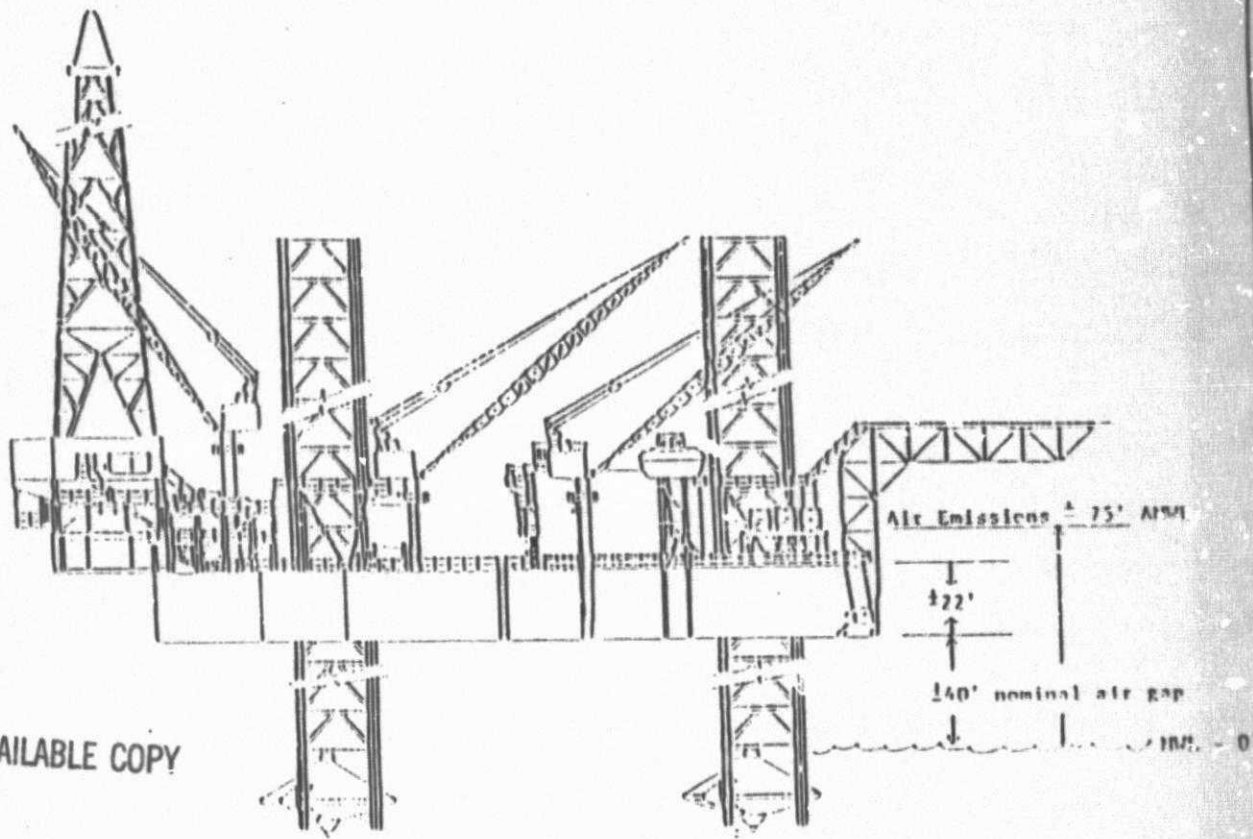
REFERENCES

Production - EPA 450/3-77-026 (June, 1977) - "Atmospheric
Emissions from Offshore Oil and Gas
Development and Production", pp. 81-116.

Boats - EPA Report AP-42 - "Compilation of Air
Pollutant Emission Factors", 3rd Edition,
(August, 1977), pp.116, 125 and 127.

FINDINGS OF AIR QUALITY REVIEW

As per DOI/MMS regulations, this facility is exempt from further air quality review as it has been determined that its operations will not have a significant adverse impact on air quality.



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OUTWARD PROFILE