

UNITED STATES GOVERNMENT
MEMORANDUM

August 27, 2012

To: Public Information (MS 5030)
From: Plan Coordinator, FO, Plans Section (MS
5231)

Subject: Public Information copy of plan
Control # - N-09659
Type - Initial Exploration Plan
Lease(s) - OCS-G32263 Block - 295 Main Pass Area
Operator - Apache Corporation
Description - Wells A, B, C, D, and E
Rig Type - JACKUP

Attached is a copy of the subject plan.

It has been deemed submitted as of this date and is under review for approval.

Michelle Griffitt
Plan Coordinator

Site Type/Name	Botm Lse/Area/Blk	Surface Location	Surf Lse/Area/Blk
WELL/A	G32263/MP/295	4866 FNL, 2365 FWL	G32263/MP/295
WELL/B	G32263/MP/295	7663 FNL, 3001 FWL	G32263/MP/295
WELL/C	G32263/MP/295	2304 FNL, 5779 FWL	G32263/MP/295
WELL/D	G32263/MP/295	2818 FNL, 1787 FWL	G32263/MP/295
WELL/E	G32263/MP/295	4765 FNL, 3895 FWL	G32263/MP/295



INITIAL EXPLORATION PLAN

MAIN PASS BLOCK 295

LEASE NO. OCS-G 32263

OFFSHORE, LOUISIANA & MISSISSIPPI

PUBLIC COPY

Prepared By:

Cheryl Powell
Apache Corporation
2000 Post Oak Boulevard, Suite 100
Houston, Texas 77056
Phone number – 713-296-6811
Cheryl.powell@apachecorp.com

Date of Submittal: July 20, 2012
Estimated Start-up Date: November 1, 2012

OCS PLAN INFORMATION FORM

GENERAL INFORMATION						
Type of OCS Plan:	X	Exploration Plan (EP)	Development Operations Coordination Document (DOCD)			
Company Name: Apache Corporation			BOEM Operator Number: 00105			
Address: 2000 W. Sam Houston Parkway South Suite 1600 Houston, Texas 77042			Contact Person: Cheryl Powell			
			Phone Number: 713-296-6811			
			Email Address: cheryl.powell@apachecorp.com			
Lease(s): G 32263	Area: MP	Block(s): 295	Project Name (If Applicable):			
Objective(s):	<input checked="" type="checkbox"/> Oil	<input checked="" type="checkbox"/> Gas	<input type="checkbox"/> Sulphur	<input type="checkbox"/> Salt		
			Onshore Base: Venice, LA	Distance to Closest Land (Miles): 21.47		
Description of Proposed Activities (Mark all that apply)						
<input checked="" type="checkbox"/> Exploration drilling		<input type="checkbox"/> Development drilling				
<input checked="" type="checkbox"/> Well completion		<input type="checkbox"/> Installation of production platform				
<input type="checkbox"/> Well test flaring (for more than 48 hours)		<input type="checkbox"/> Installation of production facilities				
<input type="checkbox"/> Installation of caisson or platform as well protection structure		<input type="checkbox"/> Installation of satellite structure				
<input type="checkbox"/> Installation of subsea wellheads and/or manifolds		<input type="checkbox"/> Commence production				
<input type="checkbox"/> Installation of lease term pipelines		<input type="checkbox"/> Other (Specify and describe)				
Have you submitted or do you plan to submit a Conservation Information Document to accompany this plan?				Yes	X	No
Do you propose to use new or unusual technology to conduct your activities?				Yes	X	No
Do you propose any facility that will serve as a host facility for deepwater subsea development?				Yes	X	No
Do you propose any activities that may disturb an BOEM-designated high-probability archaeological area?				X	Yes	No
Have all of the surface locations of your proposed activities been previously reviewed and approved by BOEM?				Yes	X	No
Tentative Schedule of Proposed Activities						
Proposed Activity				Start Date	End Date	No. of Days
Drill & Complete Well A				11/1/12	1/20/13	80
Drill & Complete Well B				1/21/13	4/11/13	80
Drill & Complete Well C				4/12/13	7/1/13	80
Drill & Complete Well D				01/01/14	03/22/14	80
Drill & Complete Well E				03/23/14	06/11/14	80
Description of Drilling Rig			Description of Production Platform			
<input checked="" type="checkbox"/> Jackup	<input type="checkbox"/> Drillship		<input type="checkbox"/> Caisson	<input type="checkbox"/> Tension leg platform		
<input type="checkbox"/> Gorilla Jackup	<input type="checkbox"/> Platform rig		<input type="checkbox"/> Well protector	<input type="checkbox"/> Compliant tower		
<input type="checkbox"/> Semisubmersible	<input type="checkbox"/> Submersible		<input type="checkbox"/> Fixed platform	<input type="checkbox"/> Guyed tower		
<input type="checkbox"/> DP Semisubmersible	<input type="checkbox"/> Other (Attach Description)		<input checked="" type="checkbox"/> Subsea manifold	<input type="checkbox"/> Floating production system		
<input type="checkbox"/> Drilling Rig Name (If Known):			<input type="checkbox"/> Spar	<input type="checkbox"/> Other (Attach description)		
Description of Lease Term Pipelines						
From (Facility/Area/Block)	To (Facility/Area/Block)	Diameter (inches)	Length (Feet)			

SECTION L
SUPPORT VESSELS AND AIRCRAFT INFORMATION
(30 CFR 250.224 and 250.257)

A. GENERAL

Apache will travel the most practical, direct route from the shorebase to Main Pass Block 295 as permitted by weather and traffic conditions.

Type	Maximum Fuel Tank Capacity	Maximum Number in Area at Any Time	Trip Frequency or Duration
Tug Boats	3000 bbls	2	As needed
Crew Boat	400 bbls	1	3/week
Supply Boat	2380 bbls	1	3/week
Helicopter	760 gallons	1	As Needed

B. DIESEL OIL SUPPLY VESSELS

Size of Fuel Supply Vessel	Capacity of Fuel Supply Vessel	Frequency of Fuel Transfers	Route Fuel Supply Vessel Will Take
200'	2380 bbls	Weekly	From the shorebase in Venice, LA to Main Pass Block 295, then back to shorebase

C. DRILLING FLUID TRANSPORTATION

Not required

D. SOLID AND LIQUID WASTE TRANSPORTATION

Type of Waste Approx. Composition	Total Amount	Name/Location	Rate	Transportation Method
Completion fluid	200 bbl/well	Venice	15 bbls/day	Drums on supply boat
Used oil	500 gal/mth	Venice, LA	16 gal/day	Drums on supply boat
Trash & debris	1000 cu/ft/mth	Venice, LA	NA	Bag in compactor bag on boat

E. VICINITY MAP

A vicinity map showing the location of the proposed activities relative to the shoreline, the distance of the proposed activities from the shoreline and the support base, and the primary route of the support vessels and aircraft that will be used when traveling between the onshore support facilities is included as **Attachment L-1**.

SECTION K
ENVIRONMENTAL MITIGATION MEASURES INFORMATION
(30 CFR 250.213 and 250.243)

A. MEASURES TAKEN TO AVOID, MINIMIZE, AND MITIGATE IMPACTS

Activities in this Exploration Plan do not impact the State of Florida.

B. INCIDENTAL TAKES

There is no reason to believe that the protected species may be incidentally taken by the proposed activities.

Apache Corporation will adhere to the requirements as set forth in the following documents, as applicable, to avoid or minimize impacts to any of the species listed in the ESA as a result of the operations conducted herein:

- BOEM/BSEE Joint NTL 2012-G01, "Vessel Strike Avoidance and Injured/Dead Protected Species Reporting
- BSEE NTL 2012-G01, "Marine Trash and Debris Awareness and Elimination"
- BOEM/BSEE Joint NTL 2012-G02, "Implementation of Seismic Survey Mitigation Measures and Protected Species Observer Program"

**COASTAL ZONE MANAGEMENT
CONSISTENCY CERTIFICATION**

INITIAL EXPLORATION PLAN

MAIN PASS BLOCK 295

LEASE OCS-G 32263

The proposed activities described in detail in this OCS Plan comply with Mississippi's approved Coastal Management Program and will be conducted in a manner consistent with such Program

Apache Corporation
Lessee or Operator



Certifying Official



Date

Online Payment

Step 3: Confirm Payment

1 | 2 | 3

Thank you.
Your transaction has been successfully completed.

Pay.gov Tracking Information

Application Name: BOEM Exploration Plan - BF
Pay.gov Tracking ID: 257GL73J
Agency Tracking ID: 74340539508
Transaction Date and Time: 07/30/2012 16:18 EDT

Payment Summary

Address Information	Account Information	Payment Information
<p>Account Apache Holder Name: Corporation, MMS Billing Address: P.O. Box 27709 Billing Address 2: City: Houston State / Province: TX Zip / Postal Code: 77027-7709 Country: USA</p>	<p>Card Type: Visa Card Number: *****8394 Region: Gulf of Mexico Cheryl Powell 713- Contact: 296-6811 Company Apache Name/No: Corporation, 00105 Lease Number(s): 32263, , , , Area-Block: Main Pass MP, 295: Surface 5 Locations: , , , , ,</p>	<p>Payment Amount: \$17,210.00 Transaction Date 07/30/2012 and Time: 16:18 EDT</p>

Initial Exploration Plan

Lease OCS-G 32263, Main Pass Block 295

TABLE OF CONTENTS

SECTION A	Contents of Plan
SECTION B	General Information
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SECTION D	H2S Information
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SECTION G	Air Emissions Information
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SECTION L	Support Vessels and Aircraft Information
SECTION M	Onshore Support Facilities Information
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SECTION O	Environmental Impact Analysis
SECTION P	Administrative Information

SECTION A
CONTENTS OF PLAN
(30 CFR 250.211 AND 250.241)

A. PLAN INFORMATION FORM

Apache Corporation submits this Initial Exploration Plan to allow for the drilling and completion of Wells A through E. Tentative schedules from start to completion of the drilling and completion activities and information regarding the proposed locations are included on the OCS Plan Information Forms BOEM-137, **Attachments A-1 and A-6.**

B. LOCATION

A location and bathymetry plat, prepared in accordance with Notice to Lessees (NTL) 2008-G04, depicting the surface locations, bottom-hole locations and water depths of each proposed well are Included as **Attachment(s) A-7 and A-8.**

There will not be any anchors associated with the proposed operations.

C. SAFETY AND POLLUTION PREVENTION FEATURES

During the proposed exploration activities, Apache will utilize a typical jack-up drilling rig during the proposed operations. Rig specifications will be made part of each Application for Permit to Drill.

Safety features on the drilling unit will include well control, pollution prevention, welding procedure and blowout prevention equipment as described in Title 30 CFR Part 250, Subparts C, D, E, G and O and as further clarified by BSEE Notices to Lessees, and current policy making invoked by the BOEM.

The BSEE/BOEM is required to conduct onsite inspections of offshore facilities to confirm operators are complying with lease stipulations, operating regulations, approved plans, and other conditions, as well as to assure safety and pollution prevention requirements are being met. The National Potential Incident of Noncompliance (PINC) List serves as the baseline for these inspections. The BSEE also inspects the stockpiles of equipment listed in the operator's approved Regional Oil Spill Response Plan that would be used for the containment and cleanup of hydrocarbon spills.

Appropriate life rafts, life jackets, ring buoys, etc., will be maintained on the facility at all times as mandated by the U.S. Coast Guard regulations contained in Title 33 CFR.

Supervisory and certain designated personnel on-board the facility will be familiar with the effluent limitations and guidelines for overboard discharges into the receiving waters, as outlined in the NPDES General Permit GMG 290000.

Pollution prevention measures include installation of curbs, gutters, drip pans, and drains on drilling deck areas to collect all contaminants and debris.

D. STORAGE TANKS AND/OR PRODUCTION VESSELS

Information regarding the storage tanks that will be used to conduct the drilling operations proposed in this plan that will store oil, as defined at 30 CFR 254.6 is provided in the table below. Only those tanks with a capacity of 25 barrels or more are included.

Type of Storage Tank	Type of Facility	Tank Capacity (bbls)	Number of Tanks	Total Capacity (bbls)	Fluid Gravity (API)
Fuel Oil (Marine Diesel)	Jack-up	1418	2	2836	32.4°

E. POLLUTION PREVENTION MEASURES (FLORIDA ONLY)

Not applicable

F. ADDITIONAL MEASURES

Apache does not propose additional safety, pollution prevention, or early spill detection measures beyond those required by 30 CFR 250.

OCS PLAN INFORMATION FORM

GENERAL INFORMATION										
Type of OCS Plan:	X	Exploration Plan (EP)	Development Operations Coordination Document (DOCD)							
Company Name: Apache Corporation			BOEM Operator Number: 00105							
Address: 2000 W. Sam Houston Parkway South Suite 1600 Houston, Texas 77042			Contact Person: Cheryl Powell							
			Phone Number: 713-296-6811							
			Email Address: cheryl.powell@apachecorp.com							
Lease(s): G 32263	Area: MP		Block(s): 295	Project Name (If Applicable):						
Objective(s):	<input checked="" type="checkbox"/> Oil	<input checked="" type="checkbox"/> Gas	<input type="checkbox"/> Sulphur	<input type="checkbox"/> Salt	Onshore Base: Venice, LA			Distance to Closest Land (Miles): 21.47		
Description of Proposed Activities (Mark all that apply)										
<input checked="" type="checkbox"/> Exploration drilling					<input type="checkbox"/> Development drilling					
<input checked="" type="checkbox"/> Well completion					<input type="checkbox"/> Installation of production platform					
<input type="checkbox"/> Well test flaring (for more than 48 hours)					<input type="checkbox"/> Installation of production facilities					
<input type="checkbox"/> Installation of caisson or platform as well protection structure					<input type="checkbox"/> Installation of satellite structure					
<input checked="" type="checkbox"/> Installation of subsea wellheads and/or manifolds					<input type="checkbox"/> Commence production					
<input type="checkbox"/> Installation of lease term pipelines					<input type="checkbox"/> Other (Specify and describe)					
Have you submitted or do you plan to submit a Conservation Information Document to accompany this plan?								Yes	X	No
Do you propose to use new or unusual technology to conduct your activities?								Yes	X	No
Do you propose any facility that will serve as a host facility for deepwater subsea development?								Yes	X	No
Do you propose any activities that may disturb an BOEM-designated high-probability archaeological area?								X	Yes	No
Have all of the surface locations of your proposed activities been previously reviewed and approved by BOEM?								Yes	X	No
Tentative Schedule of Proposed Activities										
Proposed Activity							Start Date	End Date	No. of Days	
Drill & Complete Well A							11/1/12	1/20/13	80	
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Drill & Complete Well C							4/12/13	7/1/13	80	
Drill & Complete Well D							01/01/14	03/22/14	80	
Drill & Complete Well E							03/23/14	06/11/14	80	
Description of Drilling Rig					Description of Production Platform					
<input checked="" type="checkbox"/> Jackup		<input type="checkbox"/> Drillship			<input type="checkbox"/> Caisson		<input type="checkbox"/> Tension leg platform			
<input type="checkbox"/> Gorilla Jackup		<input type="checkbox"/> Platform rig			<input type="checkbox"/> Well protector		<input type="checkbox"/> Compliant tower			
<input type="checkbox"/> Semisubmersible		<input type="checkbox"/> Submersible			<input type="checkbox"/> Fixed platform		<input type="checkbox"/> Guyed tower			
<input type="checkbox"/> DP Semisubmersible		<input type="checkbox"/> Other (Attach Description)			<input checked="" type="checkbox"/> Subsea manifold		<input type="checkbox"/> Floating production system			
<input type="checkbox"/> Drilling Rig Name (If Known):					<input type="checkbox"/> Spar		<input type="checkbox"/> Other (Attach description)			
Description of Lease Term Pipelines										
From (Facility/Area/Block)			To (Facility/Area/Block)			Diameter (inches)		Length (Feet)		

OCS PLAN INFORMATION FORM (CONTINUED)
 Include one copy of this page for each proposed well/structure

Proposed Well/Structure Location			
Well or Structure Name/Number (If renaming well or structure, reference previous name): A			Subsea Completion
Anchor Radius (if applicable) in feet: N/A			<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	Surface Location	Bottom-Hole Location (For Wells)	
Lease No.	OCS-G 32263	OCS-G 32263	
Area Name	Main Pass	Main Pass	
Block No.	295	295	
Blockline Departures (in feet)	N/S Departure: 4866' F NL		
	E/W Departure: 2365' FWL		
Lambert X-Y coordinates	X: 2,858,960.00		
	Y: 228,964.00		
Latitude/ Longitude	Latitude: 29°16'06".683"		
	Longitude: -88°38'21.245"		
	TVD (Feet):	MD (Feet):	Water Depth (Feet): 218'

Anchor Locations for Drilling Rig or Construction Barge (If anchor radius supplied above, not necessary)					
Anchor Name or No.	Area	Block	X Coordinate	Y Coordinate	Length of Anchor Chain on Seafloor
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	

Paperwork Reduction Act of 1995 Statement: The Paperwork Reduction Act of 1995 (44 U.S.C. Chapter 35) requires us to inform you that BOEM collects this information as part of an applicant's Exploration Plan or Development Operations Coordination Document submitted for BOEM approval. We use the information to facilitate our review and data entry for OCS plans. We will protect proprietary data according to the Freedom of Information Act and 30 CFR 250.196. An agency may not conduct or sponsor, and a person is not required to respond to, a collection of information unless it displays a currently valid Office of Management and Budget Control Number. The use of this form is voluntary. The public reporting burden for this form is included in the burden for preparing Exploration Plans and Development Operations Coordination Documents. We estimate that burden to average 580 hours per response, including the time for reviewing instructions, gathering and maintaining data, and completing and reviewing the form. Direct comments regarding the burden estimate or any other aspect of this form to the Information Collection Clearance Officer, Mail Stop 4230, Minerals Management Service, 1849 C Street, N.W., Washington, DC 20240.

OCS PLAN INFORMATION FORM (CONTINUED)
 Include one copy of this page for each proposed well/structure

Proposed Well/Structure Location

Well or Structure Name/Number (If renaming well or structure, reference previous name): B		Subsea Completion
Anchor Radius (if applicable) in feet:		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	Surface Location	Bottom-Hole Location (For Wells)
Lease No.	OCS-G 32263	OCS-G 32263
Area Name	Main Pass	Main Pass
Block No.	295	295
Blockline Departures (in feet)	N/S Departure: 7663' FNL	
	E/W Departure: 3001' FWL	
Lambert X-Y coordinates	X: 2,859,596.00	
	Y: 226,167.00	
Latitude/ Longitude	Latitude: 29°15'38.853"	
	Longitude: -88°38'14.809"	
	TVD (Feet):	MD (Feet): Water Depth (Feet): 219'

Anchor Locations for Drilling Rig or Construction Barge (If anchor radius supplied above, not necessary)

Anchor Name or No.	Area	Block	X Coordinate	Y Coordinate	Length of Anchor Chain on Seafloor
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	

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OCS PLAN INFORMATION FORM (CONTINUED)
 Include one copy of this page for each proposed well/structure

Proposed Well/Structure Location

Well or Structure Name/Number (If renaming well or structure, reference previous name): C		Subsea Completion	
Anchor Radius (if applicable) in feet: N/A		<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
	Surface Location	Bottom-Hole Location (For Wells)	
Lease No.	OCS-G 32263	OCS-G 32263	
Area Name	Main Pass	Main Pass	
Block No.	295	295	
Blockline Departures (in feet)	N/S Departure: 2304' FNL		
	E/W Departure: 5779' FWL		
Lambert X-Y coordinates	X: 2,862,374.00		
	Y: 231,526.00		
Latitude/ Longitude	Latitude: 29°16'31.244"		
	Longitude: -88°37'42.028"		
	TVD (Feet):	MD (Feet):	Water Depth (Feet): 217'

Anchor Locations for Drilling Rig or Construction Barge (If anchor radius supplied above, not necessary)

Anchor Name or No.	Area	Block	X Coordinate	Y Coordinate	Length of Anchor Chain on Seafloor
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	

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OCS PLAN INFORMATION FORM (CONTINUED)
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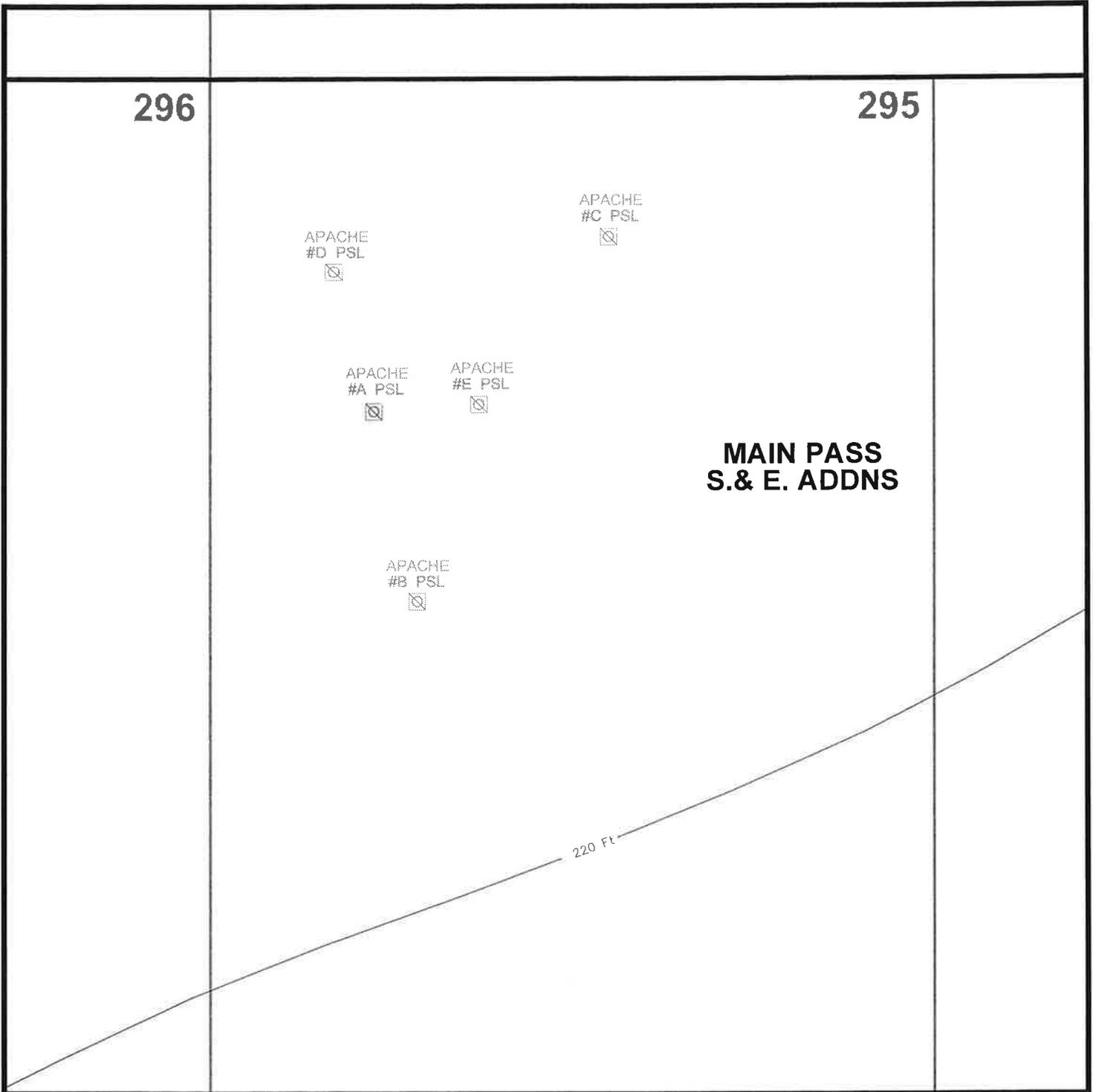
Proposed Well/Structure Location					
Well or Structure Name/Number (If renaming well or structure, reference previous name): D					Subsea Completion
Anchor Radius (if applicable) in feet: N/A					<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	Surface Location			Bottom-Hole Location (For Wells)	
Lease No.	OCS-G 32263			OCS-G 32263	
Area Name	Main Pass			Main Pass	
Block No.	295			295	
Blockline Departures (in feet)	N/S Departure: 2818' FNL				
	E/W Departure: 1787' FWL				
Lambert X-Y coordinates	X: 2,858,382.00				
	Y: 231,012.00				
Latitude/ Longitude	Latitude: 29°16'27.088"				
	Longitude: -88°38'27.226"				
	TVD (Feet):		MD (Feet):	Water Depth (Feet): 216'	
Anchor Locations for Drilling Rig or Construction Barge (If anchor radius supplied above, not necessary)					
Anchor Name or No.	Area	Block	X Coordinate	Y Coordinate	Length of Anchor Chain on Seafloor
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
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OCS PLAN INFORMATION FORM (CONTINUED)
 Include one copy of this page for each proposed well/structure

Proposed Well/Structure Location			
Well or Structure Name/Number (If renaming well or structure, reference previous name): E			Subsea Completion
Anchor Radius (if applicable) in feet: N/A			<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	Surface Location	Bottom-Hole Location (For Wells)	
Lease No.	OCS-G 32263	OCS-G 32263	
Area Name	Main Pass	Main Pass	
Block No.	295	295	
Blockline Departures (in feet)	N/S Departure: 4765' FNL		
	E/W Departure: 3895' FWL		
Lambert X-Y coordinates	X: 2,860,490.00		
	Y: 229,065.00		
Latitude/ Longitude	Latitude: 29°16'07.327"		
	Longitude: -88°38'03.949"		
	TVD (Feet):	MD (Feet):	Water Depth (Feet): 218'

Anchor Locations for Drilling Rig or Construction Barge (If anchor radius supplied above, not necessary)					
Anchor Name or No.	Area	Block	X Coordinate	Y Coordinate	Length of Anchor Chain on Seafloor
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	
			X =	Y =	

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#A PSL	#B PSL	#C PSL	#D PSL	#E PSL
LAT: 29° 16' 06.683" N	LAT: 29° 15' 38.853" N	LAT: 29° 16' 31.244" N	LAT: 29° 16' 27.088" N	LAT: 29° 16' 07.327" N
LONG: -88° 38' 21.245" W	LONG: -88° 38' 14.809" W	LONG: -88° 37' 42.028" W	LONG: -88° 38' 27.226" W	LONG: -88° 38' 03.949" W
X = 2,858,980.00	X = 2,859,596.00	X = 2,862,374.00	X = 2,858,382.00	X = 2,880,490.00
Y = 228,964.00	Y = 228,167.00	Y = 231,526.00	Y = 231,012.00	Y = 229,065.00
4886.00' FNL of MP 295	7683.00' FNL of MP 295	2304.00' FNL of MP 295	2818.00' FNL of MP 295	4785.00' FNL of MP 295
2365.00' FWL of MP 295	3001.00' FWL of MP 295	5779.00' FWL of MP 295	1787.00' FWL of MP 295	3895.00' FWL of MP 295





MAIN PASS 295
OFFSHORE LOUISIANA
DOCD

BATHOMETRY PLAT

Proposed Well Location's #A, B, C, D & E

CONTOUR INTERVAL:	Date: 05-07-12
INTERPRETATION BY: J. Young	DRAFTED BY: LH
SCALE: 1"=2000'	APPROVED BY:
MAP: H:\ACAD\offshore\MP295\docd\MP295_docd_2k_jy_bathy plat.dwg	

Attachment A-8

SECTION B
GENERAL INFORMATION
(30 CFR 250.213 and 250.243)

A. APPLICATIONS AND PERMITS

List all individual or site-specific application approvals you must obtain to conduct your proposed activities. Do not list general NPDES or COE Permits.

Application/Permit	Issuing Agency	Status
Application for Permit to Drill	BSEE	Pending
APM - Completion	BSEE	Pending

B. DRILLING FLUIDS

Using the table below, provide information on the types and amounts of the drilling fluids you plan to use to drill your proposed wells when you propose the following:

Type of Drilling Fluid	Estimated Volume of Drilling Fluid to be Used per Well
Water-based (seawater, freshwater, barite)	51,151 bbl/well
Oil-based (diesel, minerals, oil)	N/A
Synthetic-based (internal olefin, ester)	N/A

C. NEW OR UNUSUAL TECHNOLOGY

Apache does not propose to use new techniques or unusual technology to carry out these proposed exploration activities; however, the best available and safest technologies (BAST) as referenced in Title 30 CFR 250 will be incorporated as standard operational procedures.

D. BONDING STATEMENT

The bond requirements for the activities and facilities proposed in this EP are satisfied by a \$3,000,000.00 areawide bond, furnished and maintained according to 30 CFR 256, subpart I; NTL No. 2000-G16, "Guidelines for General Lease Surety Bonds;" and a current BOEM-approved deferment from providing additional security under 30 CFR 256.53(d) and National NTL No. 2003-N06, "Supplemental Bond Procedures". If at any point, Apache no longer qualifies for a supplemental bonding deferment, Apache will either provide the required additional security or a third party guarantee within 60 days after such disqualification.

E. OIL SPILL FINANCIAL RESPONSIBILITY (OSFR)

Apache (BOEM company number 00105) will demonstrate oil spill financial responsibility for the facilities proposed in this EP according to 30 CFR Part 253; and NTL No. 99-N01, "Guidelines for Oil Spill Financial Responsibility for Covered Facilities".

F. DEEPWATER WELL CONTROL STATEMENT (DEEPWATER ONLY)

Not applicable for proposed operations.

G. BLOWOUT SCENARIO

Estimated Flow Rate: 31,940 BCPD

Max Duration of Blowout: 211 Days

Total Volume: 6,739,340 Bbls

Maximum Duration of blowout (days)

The duration of the blowout will be a function of the well bridging over – the ability of surface intervention – or as a last resort would be drilling a relief well. The expected timeframes for the different outcomes would be: 1) Bridging over in 2-3 days, 2) surface intervention 7 to 30 days and 3) a relief well 140 days.

Discussion of potential for well to bridge over

The MP 295 #1 (A) well will be an abnormal pressured oil well; the primary targets will be a consolidated oil sand. Due to the pressure drop caused by an uncontrolled blowout would result in formation failure and a reasonably high chance of bridging over. Typical GOM wells usually result in a strong chance of sanding up or bridging over due to the high amount of solids that would be produced resulting from formation collapse as the pressure in the wellbore is reduced. If any water zones are exposed this will be accelerated. We typically expect 24 – 48 hours to bridge over. Bridging over is the common outcome of conventional GOM wells. This is usually the period where equipment is being moved to location for a surface intervention.

Discussion of likelihood for surface intervention to stop blowout

Surface intervention would be viable as long as the surface casing or BOP's are not damaged beyond use. If the blowout results in a fire which destroys the surface equipment surface intervention could be limited or not an option. Surface intervention would be the first line of defense after a blowout occurs – the actual intervention technique chosen will depend on actual conditions and ability to access the existing well. There can be simple solutions such as rig up and bullhead kill mud or to more complex solutions such as stabbing over a new BOP and closing the well. The actual solution will depend on actual conditions. A surface intervention is faster than a relief well and is usually started as conditions permit and can be done while relief well planning is being conducted. Apache

would immediately consult with a well control company (Wild Well or Boots and Coots) and begin surface intervention planning and relief well planning. Typical blowouts can be controlled with surface intervention. The easy access to the wellhead and BOP's makes this option viable in most cases.

RELIEF WELL

Name of Specific rig identified for relief well

The Ensco 75 is a specific rig that could drill the relief well. The water depth is 218' which will limit rig selection to 300' or better jack ups. The Ensco 75 is a 400' IC class rig.

Rig under contract

Apache currently has the Ensco 75 under contract. The rig is expected to be in the EI 330 area during the drilling of this well

Rig package constraints

The water depth is 218' which limits rig selection to 300' class rigs or better, in addition it is a deep well which will require hookload capacity at 1,000,000 lbs.

Estimated time to drill Relief Well

The total time to drill the relief well is 140 days

Time to acquire rig

5 days will be required to acquire the rig and make it available for tow. It may have to suspend operations that are currently ongoing.

Time to move rig onsite

The tow time will be 5 days. The Ensco 75 is currently scheduled to be in the EI 330 area when this well would be drilled.

Drilling Time

The drilling time will be 130 days.

Statement whether the possibility of using a nearby platform was considered, if feasible

It is preferred to drill relief wells from an open water location rather than a platform location; it gives the best option on designing a simple intercept well and allows a greater choice on rig availability.

WCD Calculations

Submitted for EP or DOCD – Yes, see attached

Submitted for Regional OSRP – Yes, see attached

Used appropriate WCD scenario from OSRP – Yes, drilling

WCD scenario volume from OSRP has not changed - Correct

Other

Measures to enhance ability to prevent and to reduce the likelihood of a blowout

The key to preventing blowouts is early detection. Using good oil field practices will minimize blow out risks. Keeping the BOP's in good working condition is the first step. Monitoring during the drilling process is key to early detection, watching for flow increases and or pit gains, checking for flow on connections, maintaining the MW correctly, utilizing a trip tank on all trips are all part of a

successful strategy to catch kicks early and properly handling a small kick is much easier than successfully circulating out a large kick. Keeping all rig personnel properly trained in how to respond to well control events is also part of a successful strategy. This starts at the lowest level – the man on the shaker is the first to see flow change – the driller must be confident that when there is doubt shut it in and figure it out after it's shut in. This keeps kick sizes small. Other blowouts can occur during the non-drilling phase – flow after cementing is a common issue – utilizing good cementing techniques, designing a cement slurry with additives that help to prevent flow after cementing – and following good practices. This is an abnormal pressured well and we will utilize liner top packers to provide additional mechanical seals.

Measure to enhance ability to conduct effective and early intervention in the event of a blowout

Apache has a working relationship with several well control experts, Wild Well, Cudd, and Boots and Coots. They would be brought in to provide expert advice on implementing surface intervention and provide onsite supervision to any operation. Surface intervention equipment is readily available – rental BOP's and skid units for pumping.

Arrangements for drilling relief wells

Apache has a working relationship with several well control experts, Wild Well, Cudd, and Boots and Coots. They would be brought in to provide expert advice on drilling a relief well. We utilize Baker Inteq on most of our directional wells and they have provided technical support in the 3 relief wells that we have successfully drilled in the past. Apache will typically have several jackup rigs under contract that could be made available to drill a relief well. We have successfully drilled relief wells in the past.

Any other measures

None

SECTION C
GEOLOGICAL AND GEOPHYSICAL INFORMATION
(30 CFR 250.214 AND 250.244)

A. GEOLOGICAL DESCRIPTION

Proprietary Data

B. STRUCTURE CONTOUR MAP

Proprietary Data

C. INTERPRETED 2-D And/Or 3-D SEISMIC LINE(S)

Attached to one Proprietary Information copy of this plan, are interpreted seismic lines. These lines are migrated, annotated with depth scale, and are within 500' of the surface locations of the proposed wells.

D. GEOLOGICAL STRUCTURE CROSS-SECTIONS

Proprietary Data

E. SHALLOW HAZARDS REPORT

A shallow hazards survey was conducted over Main Pass Block 295.

Two copies of a shallow hazard report and associated CD's are being submitted to the BOEM under separate cover.

F. SHALLOW HAZARDS ASSESSMENT

A shallow hazards assessment has been prepared for each proposed surface location, evaluating seafloor and subsurface geological and manmade features and conditions that may adversely affect drilling operations, and is included as **Attachment(s) C-3 through C-7.**

G. HIGH-RESOLUTION SEISMIC LINES

Included under separate cover are annotated high-resolution survey lines closest to each of the proposed well locations.

H. STRATIGRAPHIC COLUMN

Proprietary Data

I. TIME VS DEPTH TABLES

Sufficient well control data for the target areas proposed in this EP exists; therefore, seismic time versus depth tables for the proposed well locations are not required.

WELL 'A' SURFACE LOCATION

Apache Corporation selected Tesla Offshore, LLC to prepare this shallow hazard assessment for the proposed drill site to comply with NTL No. 2008-G05 from the Bureau of Ocean Energy Management. Geophysical record copies are enclosed for the magnetometer, side scan sonar, subbottom profiler, echo sounder, and processed seismic sections from the survey line nearest the proposed well site as required by the BOEM in NTL No. 2008-G04 (Appendix C).

Apache Corporation proposes to drill the OCS-G 32263 'A' Well from the following common surface location:

Datum:	Spheroid:	Projection:	Zone:	Central Meridian:
NAD 27	Clarke 1866	LAMBERT	LAS	91° 20' West
Latitude: 29° 16' 06.683" N			Longitude: 88° 38' 21.245" W	
X: 2,858,960			Y: 228,964	
FWL: 2,365'			FNL: 4,866'	

- Water depth is approximately 218 feet surrounding the proposed drill site. The gently undulating seafloor generally slopes towards the south at an approximate rate of 4.7 feet per mile.
- Seafloor sediments reportedly consist of clayey sand (MMS Visual No. 3, 1983).
- Reported Seafloor installations within 1,000 feet of the proposed well site include the Sonat 24" pipeline (Segment No. 3367) and the 12" - 24" Sonat pipeline (Segment 15055). Segment 15055 was verified as-built approximately 550' N of the proposed surface location by both magnetometer and sonar data. Segment 3367 was not verified at its as-built position and may be displaced based on a linear magnetic anomaly trend located approximately 930' S of the proposed surface location. Both as-built (blue) and as-found pipeline positions (red and green) are plotted on the enclosed maps.
- Magnetic anomalies are not present within 300 meters (984') of the proposed well site. The

closest magnetic anomaly is number 26, which is recommended for avoidance. Anomaly number 26 is an 11nT positive monopole with a recorded duration of 220', and is located approximately 1,040' NNE of the proposed surface location. It was recommended for avoidance by a distance of 110'.

- Side scan sonar verified that the seafloor immediately surrounding the proposed well site was clear of protruding obstructions. The seafloor surrounding the proposed well site exhibits a moderate degree of reflection. No unidentified sonar targets were recorded within 300m (984') of the proposed surface location.
- Subbottom profiler data (2-10 kHz) data recorded a moderately reflective seafloor underlain by approximately 12' of transparent sediments, sporadically interlaced with low to moderate parallel to sub-parallel reflectors before the acoustic signal was attenuated due to the surficial transgressive sands and underlying deltaic deposits. A moderate reflector that was mapped as part of an isopach unit was present at a depth of 12' BML at the proposed well site. This horizon likely represents transgressive sediments deposited over the former delta during rising sea levels. No distinct channels or faults were observed in the resolved near-surface sediments, however clinoforms were observed throughout the survey area that may represent foreset beds. The proposed location lies outside of these zones and the near-seafloor strata at this location appears to be stable. However, geophysical data cannot fully assess the geotechnical properties of sediments at the proposed well site. It is recommended that geotechnical properties at the proposed drill site be assessed prior to setting a rig.
- Processed airgun data show amplitude anomalies, or "bright spots", representing possible overpressured shallow gas zones or pockets that were interpreted from 12-fold migrated, reverse to field polarity, seismic sections at depths of 0.116 to 0.973 seconds BSL within the survey area. An aerially extensive amplitude anomaly extending west and southeast of the proposed surface location is located approximately 100 feet north, at a depth of 355 milliseconds BSL. This anomaly is considered moderate to highly reflective and may

represent larger gas pockets that could present a danger to drilling. Although the location will not intersect this anomaly based on its projected extents, the ability to accurately map subbottom features is limited by the 300 meter survey line spacing interval. Engineers should be prepared for potential increases of pressure at this depth in case the anomaly is intersected. No faults were located within 300 meters (984') of the proposed surface location, however an areally extensive fault is located approximately 1,050 feet S of the proposed well site at a depth of 273 ms BSL. According to MMS 1986 Visual No. 5, a salt diapir underlies the entire northern portion of this block. Acoustically attenuated chaotic sediments were identified in the central portion of the survey area, approximately 750 feet south of the proposed well site. This zone is inferred as the top of the salt diapir and is located at a depth of approximately 536 milliseconds BSL.

WELL 'B' SURFACE LOCATION

Apache Corporation selected Tesla Offshore, LLC to prepare this shallow hazard assessment for the proposed drill site to comply with **NTL No. 2008-G05** from the Bureau of Ocean Energy Management. Geophysical record copies are enclosed for the magnetometer, side scan sonar, subbottom profiler, echo sounder, and processed seismic sections from the survey line nearest the proposed well site as required by the BOEM in **NTL No. 2008-G04** (Appendix C).

Apache Corporation proposes to drill the OCS-G 32263 Well 'B' from the following surface location:

Datum:	Spheroid:	Projection:	Zone:	Central Meridian:
NAD 27	Clarke 1866	LAMBERT	LAS	91° 20' West
Latitude: 29° 15' 38.853" N			Longitude: 88° 38' 14.809" W	
X: 2,859,596			Y: 226,167	
FWL: 3,001'			FNL: 7,663'	

- Water depth is approximately 219 feet surrounding the proposed drill site. The gently undulating seafloor generally slopes towards the south at an approximate rate of 2 feet per mile.
- Seafloor sediments reportedly consist of clayey sand (MMS Visual No. 3, 1983).
- Seafloor installations within 300 m (984') of the proposed well site include P&A Well No. 5 located approximately 960' NE of the proposed surface location.
- Magnetic anomalies are not present within 300 meters (984') of the proposed well site. The closest magnetic anomaly is number 3, which is a 6nT dipole with a recorded duration of 128', and is located approximately 1,710' WSW of the proposed surface location. It was not recommended for avoidance.
- Side scan sonar verified that the seafloor immediately surrounding the proposed well

site was clear of protruding obstructions, and exhibits a moderate degree of reflection. No unidentified sonar targets were recorded within 300m (984') of the proposed surface location.

- Subbottom profiler data (2-10 kHz) data recorded a moderately reflective seafloor underlain by approximately 10' of transparent sediments, where a moderate reflector was observed and mapped as part of an isopach unit across the survey area. Shallow clinoforms and probable deltaic deposits were recorded below the isopach horizon to maximum depths of 18' and 26' BML, at which depths the acoustic signal was attenuated due to lack of density in the underlying sediments. The proposed surface location is entirely within an area of clinoform strata which may pose some issues with lateral stability of fixed platform drilling rigs. It is recommended that geotechnical properties at the proposed drill site be assessed prior to setting a rig.
- Processed airgun data show amplitude anomalies, or "bright spots", representing possible overpressured shallow gas zones or pockets that were interpreted from 12-fold migrated, reverse to field polarity, seismic sections at depths of 0.116 to 0.973 seconds BSL within the survey area. No amplitude anomalies or faults are located within 300 meters (984') of the proposed surface location. According to MMS 1986 Visual No. 5, a salt diapir underlies the entire northern portion of this block. Acoustically attenuated chaotic sediments were interpreted as the top of this salt diapir, and observed on the processed seismic data at a depth of approximately 536 milliseconds BSL directly below the proposed surface location.

WELL 'C' SURFACE LOCATION

Apache Corporation selected Tesla Offshore, LLC to prepare this shallow hazard assessment for the proposed drill site to comply with **NTL No. 2008-G05** from the Bureau of Ocean Energy Management. Geophysical record copies are enclosed for the magnetometer, side scan sonar, subbottom profiler, echo sounder, and processed seismic sections from the survey line nearest the proposed well site as required by the BOEM in **NTL No. 2008-G04** (AppendixC).

Apache Corporation proposes to drill the OCS-G 32263 Well 'C' from the following common surface location:

Datum:	Spheroid:	Projection:	Zone:	Central Meridian:
NAD 27	Clarke 1866	LAMBERT	LAS	91° 20' West
Latitude: 29° 16' 31.244" N			Longitude: 88° 37' 42.028" W	
X: 2,862,374			Y: 231,526	
FWL: 5,779'			FNL: 2,304'	

- Water depth is approximately 217 feet surrounding the proposed drill site. The gently undulating seafloor generally slopes towards the south at an approximate rate of 4.5 feet per mile.
- Seafloor sediments reportedly consist of clayey sand (MMS Visual No. 3, 1983).
- Seafloor installations are not located within 300 m (984') of the proposed well site.
- Magnetic anomalies located within 300 meters (985') of the proposed surface location include number 9, which is a 12nT dipole with a recorded duration of 265', and is located approximately 580' NW of the proposed surface location. Anomaly no. 9 is designated for avoidance by a distance of 130'.
- Side scan sonar verified that the seafloor immediately surrounding the proposed well site was clear of protruding obstructions and exhibits a moderate degree of reflection. No

unidentified sonar targets were recorded within 300m (984') of the proposed surface location.

- Subbottom profiler data (2-10 kHz) data recorded a moderate reflecting seafloor underlain by approximately 10 feet of weakly reflective deltaic deposits underlain by a more strongly reflective horizon used to create an isopach of the subseafloor structure. Sediments below the isopach horizon include clinofolds that suggest fluvial foresetting, and the possible presence of a channel directly under the proposed surface location. This may influence lateral stability of fixed platform drilling rigs. It is recommended that geotechnical properties at the proposed drill site be assessed prior to setting a rig.
- Processed airgun data showed amplitude anomalies, or "bright spots", representing possible overpressured shallow gas zones or pockets as interpreted from 12-fold migrated, reverse to field polarity, seismic sections at depths of 0.116 to 0.973 seconds BSL within the survey area. Two anomalies were interpreted within the immediate vicinity of the proposed surface location. The first anomaly is located approximately 500' W of the surface location, along the adjacent survey line, at a depth of 737 ms BSL. The second anomaly is located approximately 380 feet east of the proposed location, at the adjacent survey line, at a depth of 128 ms BSL. Although the location will not intersect these anomalies based on their projected extents, the ability to accurately map subbottom features is limited by the 300 meter survey line spacing interval. Engineers should be prepared for potential increases of pressure at these depth in case anomalies are intersected. No faults are located within 300 meters (984') of the proposed surface location.

WELL 'D' SURFACE LOCATION

Apache Corporation selected Tesla Offshore, LLC to prepare this shallow hazard assessment for the proposed drill site to comply with **NTL No. 2008-G05** from the Bureau of Ocean Energy Management. Geophysical record copies are enclosed for the magnetometer, side scan sonar, subbottom profiler, echo sounder, and processed seismic sections from the survey line nearest the proposed well site as required by the BOEM in **NTL No. 2008-G04** (Appendix C).

Apache Corporation proposes to drill the OCS-G 32263 Well 'D' from the following common surface location:

Datum:	Spheroid:	Projection:	Zone:	Central Meridian:
NAD 27	Clarke 1866	LAMBERT	LAS	91° 20' West
Latitude: 29° 16' 27.088" N			Longitude: 88° 38' 27.226" W	
X: 2,858,382			Y: 231,012	
FWL: 1,787'			FNL: 2,818'	

- Water depth is approximately 216 feet surrounding the proposed drill site. The gently undulating seafloor generally slopes towards the south at an approximate rate of 5.5 feet per mile.
- Seafloor sediments reportedly consist of clayey sand (MMS Visual No. 3, 1983).
- Seafloor installations within 1,000 feet of the proposed well site include the Noble 12" pipeline (Segment 16206) that appears to be displaced slightly from its reported as-built positions. Magnetometer and sonar data indicate that the as-found position of the Noble 12" pipeline (Segment No. 16206) is located approximately 500' NE of the proposed surface location.

- Magnetic anomalies located within 300 meters (984') include number 1, which is a 161nT dipole with a recorded duration of 166', and is located approximately 550' SW of the proposed surface location with an assigned avoidance of 100 feet.
- Side scan sonar verified that the seafloor immediately surrounding the proposed well site was clear of protruding obstructions and exhibits a moderate degree of reflecting. No unidentified sonar targets were recorded within 300m (984') of the proposed surface location.
- Subbottom profiler data (2-10 kHz) data recorded a moderate reflecting seafloor underlain by approximately 10 feet of transparent sediments underlain by a moderate to high reflector. The signal attenuates below this reflector due to lack of density in the underlying sediments. The proposed well location is located on the edge of poorly resolved clinoform features likely attributed to deltaic deposits located 7 feet BSL. Geophysical data alone cannot accurately assess the geotechnical properties of sediments at the proposed well site. It is recommended that geotechnical properties at the proposed drill site be assessed prior to setting a rig.
- Processed airgun data showed amplitude anomalies, or "bright spots", representing possible overpressured shallow gas zones or pockets interpreted from 12-fold migrated, reverse to field polarity, seismic sections at depths of 0.116 to 0.973 seconds BSL within the survey area. Three amplitude anomalies are located within 300 meters (984') of the proposed surface location. The closest anomaly is located approximately 620' NE at a depth of 199 ms BSL. The other anomalies are located approximately 725' NW at a depth of 378 ms BSL and 925' W at a depth of 414 ms BSL. No faults are located within 300 meters (985') of the proposed surface location.

WELL 'E' SURFACE LOCATION

Apache Corporation selected Tesla Offshore, LLC to prepare this shallow hazard assessment for the proposed drill site to comply with **NTL No. 2008-G05** from the Bureau of Ocean Energy Management. Geophysical record copies are enclosed for the magnetometer, side scan sonar, subbottom profiler, echo sounder, and processed seismic sections from the survey line nearest the proposed well site as required by the BOEM in **NTL No. 2008-G04** (Appendix C).

Apache Corporation proposes to drill the OCS-G 32263 Well 'E' from the following common surface location:

Datum:	Spheroid:	Projection:	Zone:	Central Meridian:
NAD 27	Clarke 1866	LAMBERT	LAS	91° 20' West
Latitude: 29° 16' 07.327" N			Longitude: 88° 38' 03.949" W	
X: 2,860,490			Y: 229,065	
FWL: 3,895'			FNL: 4,765'	

- Water depth is approximately 218 feet surrounding the proposed drill site. The gently undulating seafloor generally slopes towards the south at an approximate rate of 1.9 feet per mile.
- Seafloor sediments reportedly consist of clayey sand (MMS Visual No. 3, 1983).
- Seafloor installations within 1,000 feet of the proposed well site include the Sonat 24" pipeline (Segment No. 3367) and the 12" - 24" Sonat pipeline (Segment 15055). Segment 15055 was verified as-built approximately 500' N of the proposed surface location by both magnetometer and sonar data. Segment 3367 was not verified at its as-built position and may be displaced based on a linear magnetic anomaly trend located approximately 1,025' S of the proposed surface location. Both as-built (blue) and as-found pipeline positions (red and green) are plotted on the enclosed maps. The Noble 12" pipeline (Segment 16206) also appears to be displaced slightly from its reported as-built positions. Magnetometer and

sonar data indicate that the as-found position of the Noble 12" pipeline (Segment No. 16206) is located approximately 500' NE of the proposed surface location.

- Magnetic anomalies are not located within 300 meters (984') of the proposed surface location.
- Side scan sonar verified that the seafloor immediately surrounding the proposed well site was clear of protruding obstructions and exhibits a moderate degree of reflecting. No unidentified sonar targets were recorded within 300m (984') of the proposed surface location.
- Subbottom profiler data (2-10 kHz) data recorded a moderate reflecting seafloor underlain by approximately 14' of transparent sediments interlaced with light to moderate parallel to subparallel reflectors underlain by two moderate to high reflectors at 14 feet BSL and 17' BSL. The signal attenuates below this reflector due to lack of density in the underlying sediments. Two zones of shallow clinofolds comprised of deltaic deposits are located approximately 200' N and 900' S of the proposed well location but were not observed underneath the proposed well site. The proposed location lies outside of these zones and the near-seafloor strata at this location appears to be stable. However, geophysical data cannot fully assess the geotechnical properties of sediments at the proposed well site. It is recommended that geotechnical properties at the proposed drill site be assessed prior to setting a rig.
- Processed airgun data showed amplitude anomalies, or "bright spots", representing possible overpressured shallow gas zones or pockets interpreted from 12-fold migrated, reverse to field polarity, seismic sections at depths of 0.116 to 0.973 seconds BSL within the survey area. The proposed surface location is located within an areally extensive amplitude anomaly approximately located at a depth of 750 ms BSL. Another amplitude anomaly is located approximately 400' W at a depth of 355 ms BSL. Drilling engineers should be aware of the presence and depth of this anomaly and be prepared for potential pressure increases

when this zone is intersected. No faults are located within 300 meters (984') of the proposed surface location, however a laterally extensive fault is located approximately 1,150' S at a depth of 285 ms BSL. A zone of acoustically weak chaotic sediment, interpreted as the top of a salt diapir, is located approximately 750' SW of the proposed well site at a depth of 535 ms BSL.

SECTION D
HYDROGEN SULFIDE INFORMATION
(30 CFR 250.215 AND 240.245)

A. CONCENTRATION

Apache does not anticipate encountering any H₂S during the proposed operations.

B. CLASSIFICATION

In accordance with Title 30 CFR 250.490(c), Apache requests that Main Pass Block 295 be classified by the BOEM as H₂S absent.

C. H₂S CONTINGENCY PLAN

Not required

D. MODELING REPORT

Not applicable

SECTION E
BIOLOGICAL, PHYSICAL & SOCIOECONOMIC INFORMATION
(30 CFR 250.216 AND 250.247)

A. CHEMOSYNTHETIC COMMUNITIES REPORT

This EP does not propose activities that could disturb seafloor areas in water depths of 300 meters (985 feet) or greater; therefore, chemosynthetic information is not required.

1. Sensitive Underwater Features

The activities proposed in this plan will not take place within 500 feet of any identified topographic feature; therefore topographic features information is not required.

2. Marine Sanctuaries

Main Pass Block 295 is not located within 200 feet of any pinnacle trend feature with vertical relief equal to or greater than 8 feet; therefore, live bottom information is not required.

B. TOPOGRAPHIC FEATURES MAP

Activities proposed in this EP do not fall within 305 meters (1000 feet) of the “no activity zone”, therefore no map is required.

C. TOPOGRAPHIC FEATURES STATEMENT (SHUNTING)

All activities proposed under this EP will be conducted outside all Topographic Feature Protective Zones, therefore shunting of drill cuttings and drilling fluids is not required.

D. LIVE BOTTOMS (PINNACLE TREND) MAP

Main Pass Block 295 is not located within 200 feet of any pinnacle trend feature with vertical relief equal to or greater than 8 feet; therefore, live bottom information is not required.

E. LIVE BOTTOMS (LOW RELIEF) MAP

Main Pass Block 295 is not located within 200 feet of any pinnacle trend feature with vertical relief equal to or greater than 8 feet; therefore, live bottom (low relief) maps are not required.

F. POTENTIALLY SENSITIVE BIOLOGICAL FEATURES

Main Pass Block 295 is not located within 200 feet of potentially sensitive biological features; therefore, biologically sensitive area maps are not required.

G. REMOTELY OPERATED VEHICLE (ROV) SURVEYS

Not applicable

H. THREATENED AND ENDANGERED SPECIES, CRITICAL HABITAT, AND MARINE MAMMAL INFORMATION

Under Section 7 of the Endangered Species Act (ESA) all federal agencies must ensure that any actions they authorize, fund, or carry out are not likely to jeopardize the continued existence of a listed species, or destroy or adversely modify its designated critical habitat.

In accordance with the 30 CFR 250, Subpart B, effective May 14, 2007, and further outlined in Notice to Lessees (NTL) 2008-G04, lessees/operators are required to address site-specific information on the presence of federally listed threatened or endangered species and critical habitat designated under the ESA and marine mammals protected under the Marine Mammal Protection Act (MMPA) in the area of proposed activities under this plan.

NOAA Fisheries currently lists the Sperm Whale, Leatherback Turtle, Green Turtle, Hawksbill Turtle, and the Kemp's Ridley Turtle as endangered and the Loggerhead Turtle and Gulf Sturgeon as threatened. Currently there are no designated critical habitats for the listed species in the Gulf of Mexico Outer Continental Shelf, however, it is possible that one or more of these species could be seen in the area of our operations.

I. ARCHAEOLOGICAL REPORT

Main Pass Block 295 has been determined to have a high potential for containing archaeological properties,

Therefore, an Archaeological Survey Report has been prepared and is being submitted under separate cover.

J. AIR AND WATER QUALITY INFORMATION

Not applicable

K. SOCIOECONOMIC INFORMATION

Not applicable

SECTION F
WASTES AND DISCHARGES INFORMATION
(30 CFR 250.217 AND 250.248)

A. PROJECTED GENERATED WASTES

See attached chart.

Apache has no plans for treating, storing, or downhole disposal of these wastes.

B. PROJECTED OCEAN DISCHARGES

See attached chart.

C. MODELING REPORT

Not required

TABLE 1. WASTES YOU WILL GENERATE, TREAT AND DOWNHOLE DISPOSE OR DISCHARGE TO THE GOM

please specify if the amount reported is a total or per well amount

Projected generated waste		Projected Amount	Projected ocean discharges	Projected Downhole Disposal
Type of Waste	Composition	Projected Amount	Discharge rate	Discharge Method
Will drilling occur? If yes, you should list muds and cuttings				
<i>EXAMPLE: Cuttings wetted with synthetic based fluid</i>	<i>Cuttings generated while using synthetic based drilling</i>	X bb/well	X bb/day/well	discharge overboard
Water-based drilling fluid	Water based drilling fluid (Low pH Dispersed).	51,151 bbbs/total/well	640 bbbs / day / well	Discharge overboard
Cuttings wetted with water-based fluid	Cuttings generated while using water based drilling fluid.	6110 bbbs/total/well	77 bbbs / day / well	Discharge overboard
Cuttings wetted with synthetic-based fluid	N/A	N/A	N/A	N/A
Will humans be there? If yes, expect conventional waste				
<i>EXAMPLE: Sanitary waste water</i>	<i>Sanitary waste from living quarters</i>	X bb/well		chlorinate and discharge overboard
Domestic waste	Domestic waste from liv qtrs	85 bbbs / day/well		Raw water discharge
Sanitary waste	Sanitary waste from liv qtrs	50 bbbs / day/well		Raw water discharge
Is there a deck? If yes, there will be Deck Drainage				
Deck Drainage	Wash water from deck	100 barrels/well	4 barrels / hr/well	drainage
Will you conduct well treatment, completion, or workover?				
Well treatment fluids	NA			
Well completion fluids	17.1 ZNBR2	not discharged	N/A	N/A
Workover fluids	NA			
Miscellaneous discharges. If yes, only fill in those associated with your activity.				
Desalinization unit discharge	Salt Water	23 gal / min	23 gal / min	discharge overboard
Blowout prevent fluid	NA	NA	NA	NA
Ballast water	NA	NA	NA	NA
Blige water	Drill Water w/contaminants	2 bbbs / day/well	2 bbbs / day	discharge overboard
Excess cement at seafloor	Class 'H' cement	150 bbbs/well	75 bbbs / day for two	Discharge
Fire water	Salt Water	450 gal / min/well	450 gal / min	discharge overboard
Cooling water	Salt Water	50 gal / min/well	50 gal / min	discharge overboard
Will you produce hydrocarbons? If yes fill in for produced water.				
Produced water	NA			
Will you be covered by an individual or general NPDES permit?				
		Yes, General		

NOTE: If you will not have a type of waste, enter NA in the row.

SECTION G
AIR EMISSIONS INFORMATION
(30 CFR 250.218 AND 250.249)

EMISSIONS WORKSHEETS AND SCREENING QUESTIONS

Screen Procedures for EP's	Yes	No
Is any calculated Complex Total (CT) Emission amount (tons) associated with your proposed exploration activities more than 90% of the amounts calculated using the following formulas: $CT = 3400D^{2/3}$ for CO, and $CT = 33.3D$ for the other air pollutants (where D = distance to shore in miles)?		x
Do your emission calculations include any emission reduction measures or modified emission factors?		x
Are your proposed exploration activities located east of 87.5° W longitude?		x
Do you expect to encounter H ₂ S at concentrations greater than 20 parts per million (ppm)?		x
Do you propose to flare or vent natural gas for more than 48 continuous hours from any proposed well?		x
Do you propose to burn produced hydrocarbon liquids?		x

Plan Emission amounts were calculated using the methodology, emission factors and worksheets in Form BOEM-138 for Exploration Plans.

There are no existing facilities or activities co-located with the currently proposed activities, therefore the Complex Total Emissions are the same as the Plan Emissions and are provided in the attachment Air Quality Spreadsheets.

DOCD AIR QUALITY SCREENING CHECKLIST

OMB Control No. 1010-0049
 OMB Approval Expires: August 31, 2006

COMPANY	Apache Corporation
AREA	MP
BLOCK	295
LEASE	G 32263
PLATFORM	N/A
WELL	A thru E
COMPANY CONTACT	Cheryl Powell
TELEPHONE NO.	713-296-6811
REMARKS	Drii and Complete 5 wells.

LEASE TERM PIPELINE CONSTRUCTION INFORMATION:		TOTAL NUMBER OF CONSTRUCTION DAYS
YEAR	NUMBER OF PIPELINES	
1999		
2000		
2001		
2002		
2003		
2004		
2005		
2006		
2007		
2008		
2009		

AIR EMISSION COMPUTATION FACTORS

Fuel Usage Conversion Factors	Natural Gas Turbines		Natural Gas Engines		Diesel Recip. Engine		REF.	DATE
	SCF/hp-hr	9.524	SCF/hp-hr	7.143	GAL/hp-hr	0.0483		

Equipment/Emission Factors	units	PM	SOx	NOx	VOC	CO	REF.	DATE
NG Turbines	gms/hp-hr		0.00247	1.3	0.01	0.83	AP42 3.2-1& 3.1-1	10/96
NG 2-cycle lean	gms/hp-hr		0.00185	10.9	0.43	1.5	AP42 3.2-1	10/96
NG 4-cycle lean	gms/hp-hr		0.00185	11.8	0.72	1.6	AP42 3.2-1	10/96
NG 4-cycle rich	gms/hp-hr		0.00185	10	0.14	8.6	AP42 3.2-1	10/96
Diesel Recip. < 600 hp.	gms/hp-hr	1	1.468	14	1.12	3.03	AP42 3.3-1	10/96
Diesel Recip. > 600 hp.	gms/hp-hr	0.32	1.468	11	0.33	2.4	AP42 3.4-1	10/96
Diesel Boiler	lbs/bbl	0.084	2.42	0.84	0.008	0.21	AP42 1.3-12,14	9/98
NG Heaters/Boilers/Burners	lbs/mmmscf	7.6	0.593	100	5.5	84	AP42 1.4-1, 14-2, & 14	7/98
NG Flares	lbs/mmmscf		0.593	71.4	60.3	388.5	AP42 11.5-1	9/91
Liquid Flaring	lbs/bbl	0.42	6.83	2	0.01	0.21	AP42 1.3-1 & 1.3-3	9/98
Tank Vapors	lbs/bbl				0.03		E&P Forum	1/93
Fugitives	lbs/hr/comp.				0.0005		API Study	12/93
Glycol Dehydrator Vent	lbs/mmmscf				6.6		La. DEQ	1991
Gas Venting	lbs/scf				0.0034			

Sulfur Content Source	Value	Units
Fuel Gas	3.33	ppm
Diesel Fuel	0.4	% weight
Produced Gas(Flares)	3.33	ppm
Produced Oil (Liquid Flaring)	1	% weight

AIR EMISSION CALCULATIONS - FIRST YEAR

COMPANY Apache Corporation	AREA MP	BLOCK 295	LEASE G 32263	PLATFORM N/A	WELL A thru E	RUN TIME	CONTACT				REMARKS #REF!	ESTIMATED TONS					
							Cheryl Powell	713-298-6611	PHONE	MAXIMUM POUNDS PER HOUR		PM	SOx	NOx	VOC	CO	
OPERATIONS		RATING	MAX. FUEL GAL/HR	ACT. FUEL GAL/D	HR/D	DAYS	PM	SOx	NOx	VOC	CO	PM	SOx	NOx	VOC	CO	
DIESEL ENGINES		HP	SCF/HR	SCF/D													
DIESEL ENGINES		MMBTU/HR	SCF/HR	SCF/D													
DRILLING	PRIME MOVER->600hp diesel	11400	550.62	13214.88	24	61	8.04	36.86	276.21	8.29	60.26	5.88	26.98	202.19	6.07	44.11	
	VESSELS->600hp diesel(crew)	2265	109.3995	2625.59	6	26	1.60	7.32	54.88	1.65	11.97	0.13	0.57	4.30	0.13	0.94	
	VESSELS->600hp diesel(supply)	2265	109.3995	2625.59	10	26	1.60	7.32	54.88	1.65	11.97	0.21	0.96	7.17	0.22	1.57	
	VESSELS->600hp diesel(tugs)	4400	212.52	5100.48	18	2	3.10	14.23	106.61	3.20	23.26	0.06	0.26	1.92	0.06	0.42	
PIPELINE INSTALLATION	PIPELINE LAY BARGE diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	SUPPORT VESSEL diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	PIPELINE BURY BARGE diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	SUPPORT VESSEL diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	VESSELS->600hp diesel(crew)	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	VESSELS->600hp diesel(supply)	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
FACILITY INSTALLATION	DERRICK BARGE diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	MATERIAL TUG diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	VESSELS->600hp diesel(crew)	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	VESSELS->600hp diesel(supply)	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
PRODUCTION	RECIP. <600hp diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	RECIP. >600hp diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	SUPPORT VESSEL diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	TURBINE nat gas	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	RECIP. 2 cycle lean nat gas	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	RECIP. 4 cycle lean nat gas	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	RECIP. 4 cycle rich nat gas	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	BURNER nat gas	0	0.00	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
MISC.	TANK-	BPD	SCF/HR	COUNT													
	FLARE-	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	PROCESS VENT-	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	FUGITIVES-	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
	GLYCOL STILL VENT-	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
DRILLING	OIL BURN	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
WELL TEST	GAS FLARE	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
2012 YEAR TOTAL							14.33	65.74	492.58	14.78	107.47	6.27	28.77	215.58	6.47	47.04	
EXEMPTION CALCULATION												714.95	714.95	714.95	714.95	714.95	26264.37
DISTANCE FROM LAND IN MILES							21.5										

AIR EMISSIONS CALCULATIONS - SECOND YEAR

COMPANY Apache Corporation	MP	AREA	BLOCK 295	LEASE G 32263	PLATFORM N/A	WELL A thru E	CONTACT Cheryl Powell	PHONE 713-295-6811	REMARKS #REF!	ESTIMATED TONS															
										MAXIMUM POUNDS PER HOUR	PM	SOX	NOX	VOC	CO	PM	SOX	NOX	VOC	CO					
OPERATIONS		EQUIPMENT		RATING		ACT. FUEL		SCF/D		GAL/D		SCF/D		GAL/D		SCF/D		GAL/D		SCF/D		GAL/D			
		Diesel Engines		HP		MMBTU/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR	
		Burners		HP		MMBTU/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR		SCF/HR	
DRILLING		PRIME MOVER->600hp diesel	11400	550.62	13214.88	24	180	0.00	0.00	0.00	0.00	8.04	36.86	276.21	8.29	60.26	17.36	79.62	596.62	17.90	0.00	0.00	0.00	130.17	
		VESSELS->600hp diesel(crew)	2265	109.3995	2625.59	6	77	0.00	0.00	0.00	0.00	1.60	7.32	54.88	1.65	11.97	0.37	1.69	12.70	0.38	0.00	0.00	2.77		
		VESSELS->600hp diesel(supply)	2265	109.3995	2625.59	10	77	0.00	0.00	0.00	0.00	1.60	7.32	54.88	1.65	11.97	0.62	2.82	21.17	0.64	0.00	0.00	4.62		
		VESSELS->600hp diesel(tugs)	4400	212.52	5100.48	18	2	0.00	0.00	0.00	0.00	3.10	14.23	106.61	3.20	23.26	0.06	0.26	1.92	0.06	0.00	0.00	0.42		
PIPELINE INSTALLATION		PIPELINE LAY BARGE diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		SUPPORT VESSEL diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		PIPELINE BURY BARGE diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		SUPPORT VESSEL diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		VESSELS->600hp diesel(crew)	0	0	0.00	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		VESSELS->600hp diesel(supply)	0	0	0.00	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
FACILITY INSTALLATION		DERRICK BARGE diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		MATERIAL TUG diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		VESSELS->600hp diesel(crew)	0	0	0.00	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		VESSELS->600hp diesel(supply)	0	0	0.00	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
PRODUCTION		RECIP. <600hp diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		RECIP. >600hp diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		SUPPORT VESSEL diesel	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		TURBINE nat gas	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		RECIP. 2 cycle lean nat gas	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		RECIP. 4 cycle lean nat gas	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		RECIP. 4 cycle rich nat gas	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		BURNER nat gas	0	0.00	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
MISC.		TANK-	BPD	SCF/HR	COUNT																				
		FLARE-	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		PROCESS VENT-	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		FUGITIVES-	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		GLYCOL STILL VENT-	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		OIL BURN	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
		GAS FLARE	0	0	0.00	0	0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
2013 YEAR TOTAL								14.33	65.74	492.56	14.78	107.47	18.40	84.40	632.40	18.97	137.98	714.95	714.95	18.97	0.00	0.00	26264.37		
EXEMPTION CALCULATION		DISTANCE FROM LAND IN MILES																							
								21.5																	

AIR EMISSIONS CALCULATIONS - THIRD YEAR

COMPANY Apache Corporation	AREA M/P	BLOCK 285	LEASE G. 32263	PLATFORM N/A	WELL A. thru E	RUN TIME	CONTACT Cheryl Powell 713-295-6811 #REF!						REMARKS					
							MAXIMUM POUNDS PER HOUR						ESTIMATED TONS					
OPERATIONS	EQUIPMENT Diesel Engines	RATING HP	MAX. FUEL GAL/HR	ACT. FUEL GAL/D	HR/D	DAYS	PM	SOX	NOX	VOC	CO	PM	SOX	NOX	VOC	CO		
	Net. Gas Engines Burners	MMBTU/HR	SCF/HR	SCF/D	HR/D	DAYS												
DRILLING	PRIME MOVER>600hp diesel VESSELS->600hp diesel(crew) VESSELS->600hp diesel(supply) VESSELS->600hp diesel(tugs)	11400 2265 2265 4400	550.62 109.3995 109.3995 212.52	13274.88 2625.59 2625.59 5100.48	24 6 10 18	160 69 69 4	8.04 1.60 1.60 3.10	36.86 7.32 7.32 14.23	276.21 54.88 54.88 106.61	8.29 1.65 1.65 3.20	60.26 11.97 11.97 23.26	15.43 0.33 0.55 0.11	70.77 1.51 2.51 0.51	530.33 11.29 18.82 3.84	15.91 0.34 0.56 0.12	115.71 2.46 4.11 0.84		
PIPELINE INSTALLATION	PIPELINE LAY BARGE diesel SUPPORT VESSEL diesel PIPELINE BURY BARGE diesel SUPPORT VESSEL diesel VESSELS->600hp diesel(crew) VESSELS->600hp diesel(supply)	0 0 0 0 0 0	0 0 0 0 0 0	0.00 0.00 0.00 0.00 0.00 0.00	0 0 0 0 0 0	0 0 0 0 0 0	0.00 0.00 0.00 0.00 0.00 0.00											
FACILITY INSTALLATION	DERRICK BARGE diesel MATERIAL TUG diesel VESSELS->600hp diesel(crew) VESSELS->600hp diesel(supply)	0 0 0 0	0 0 0 0	0.00 0.00 0.00 0.00	0 0 0 0	0 0 0 0	0.00 0.00 0.00 0.00											
PRODUCTION	RECIP <600hp diesel RECIP >600hp diesel SUPPORT VESSEL diesel TURBINE nat gas RECIP 2 cycle lean nat gas RECIP 4 cycle lean nat gas RECIP 4 cycle rich nat gas RECIP 4 cycle rich nat gas BURNER nat gas	0 0 0 0 0 0 0 0 0	0 0 0 0 0 0 0 0 0	0.00 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0.00	0 0 0 0 0 0 0 0 0	0 0 0 0 0 0 0 0 0	0.00 0.00 0.00 0.00 0.00 0.00 0.00 0.00 0.00											
DRILLING WELL TEST	MISC. TANK- FLARE- PROCESS VENT- FUGITIVES- GLYCOL STILL VENT- OIL BURN GAS FLARE	0 0 0 0 0 0 0	0 0 0 0 0 0 0	0.00 0.00 0.00 0.00 0.00 0.00 0.00	0 0 0 0 0 0 0	0 0 0 0 0 0 0	0.00 0.00 0.00 0.00 0.00 0.00 0.00											
2014 YEAR TOTAL							14.33	65.74	492.58	14.78	107.47	16.42	75.30	564.27	16.93	123.11		
EXEMPTION CALCULATION	DISTANCE FROM LAND IN MILES 21.5						714.95	714.95	714.95	714.95	714.95	714.95	714.95	714.95	714.95	714.95	714.95	26264.37

SECTION H
OIL SPILLS INFORMATION
(30 CFR 250.219 AND 250.250)

A. OIL SPILL RESPONSE PLANNING

The proposed activities are in the Central Planning Area of the GOM. Therefore, a site-specific Oil Spill Response Plan (OSRP) is not required for this plan.

B. REGIONAL OSRP INFORMATION

All the proposed activities and facilities in this Exploration Plan will be covered by the Oil Spill Response Plan filed by Apache Corporation (BOEM Operator Number 00105) in accordance with 30 CFR 254 and approved on May 16, 2012.

1. SPILL RESPONSE SITES

Primary Response Equipment Location	Preplanned Staging Location
Houma, LA/Harvey, LA/ Venice, LA	Houma, LA/Harvey, LA/Venice LA

C. OSRO INFORMATION

Apache utilizes the Clean Gulf Associates (CGA) and the Marine Spill Response Corporation's (MSRC) STARS network as the primary providers for oil spill removal equipment. The MSRC STARS network provides for the closest available personnel, as well as an MSRC supervisor to operate the equipment.

D. WORST-CASE SCENARIO COMPARISON

A comparison from Apache's approved regional OSRP with the worst-case scenario from the proposed activities in this Exploration Plan is provided in the table below.

The proposed activities are exploratory activities, therefore, the drilling worst case scenario is provided as the "exploration" worst case scenario.

Category	Regional OSRP WCD	Exploration WCD
Type of Activity	Drilling	Drilling
Facility Location (Area/Block)	**SM 281	MP 295
Facility Designation	Platform E	Well A (to be designated #1)
Distance to Nearest Shoreline (miles)	24	21.47
Volume	0	
Storage tanks (total)	5	
Uncontrolled blowout	150	
Total Volume	95,700	31,940
	95,855	31,940
Type of Oil(s) (crude, condensate, diesel)	Crude	Condensate
API Gravity	30.4°	46°

**** Originally approved in Plan Control No. R-5182, and assumptions and calculations provided in Plan Control No. S-7561**

Since Apache has the capability to respond to the worst-case spill scenario included in our Regional OSRP approved on May 16, 2012, and since the worst-case scenario determined for our EP does not replace the worst-case scenario in our Regional OSRP, I hereby certify that Apache has the capability to respond, to the maximum extent practicable, to a worst-case discharge, or a substantial threat of such a discharge, resulting from the activities proposed in our EP.

E. OIL SPILL RESPONSE DISCUSSION (NEPA ANALYSIS)

SPILL RESPONSE DISCUSSION

For the purpose of NEPA and Coastal Zone Management Act analysis, the largest spill volume originating from the proposed activity would be a well blowout during drilling operations, estimated to be 31,940 barrels of condensate with an API gravity of 46°.

Land Segment and Resource Identification

Trajectories of a spill and the probability of it impacting a land segment have been projected utilizing information in the BSEE Oil Spill Risk Analysis Model (OSRAM) for the Central and Western Gulf of Mexico available on the BSEE website. The results are shown in **Figure 1**. The BSEE OSRAM identifies a 25% probability of impact to the shorelines of Plaquemines Parish, Louisiana within 10 days. Plaquemines Parish includes Barataria Bay, the Mississippi River Delta, Breton Sound and the affiliated islands and bays. This region is an extremely sensitive habitat and serves as a migratory, breeding, feeding and nursery habitat for numerous species of wildlife. Beaches in this area vary in grain particle size and can be classified as fine sand, shell or perched shell beaches. Sandy and muddy tidal flats are also abundant.

Response

Apache Corporation will make every effort to respond to the Worst Case Discharge as effectively as practicable. A description of the response equipment under contract to contain and recover the Worst Case Discharge is shown in **Figure 2**.

Using the estimated chemical and physical characteristics of condensate, an ADIOS weathering model was run on a similar product from the ADIOS oil database. The results indicate 41% or approximately 13,095 barrels of condensate would be evaporated/dispersed within 24 hours, with approximately 18,845 barrels remaining.

Spill Response MP 295, Well A	Barrels of Oil
WCD Volume	31,940
Less 41% natural evaporation/dispersion	13,095
Remaining volume	18,845
Daily dispersant capability	7,540

Figure 2 outlines equipment, personnel, materials and support vessels as well as temporary storage equipment available to respond to a spill of approximately 18,845 barrels. The volume accounts for the amount remaining after evaporation/dispersion at 24 hours. The list estimates individual times needed for procurement, load out, travel time to the site and deployment. **Figure 2** also indicates how operations will be supported.

Apache Corporation's Oil Spill Response Plan includes alternative response technologies such as dispersants. Strategies will be decided by Unified Command based on the size of the spill, weather and potential impacts. If aerial dispersants are utilized, 8 sorties (9,600 gallons) from two of the DC-3 aircrafts and 4 sorties (8,000 gallons) from the Basler aircraft would provide a daily dispersant capability of 7,540 barrels. Slick containment boom along with sorbent boom would be immediately called out and on-scene as soon as possible. Offshore response strategies may include collection of condensate with sorbent boom (inside hard boom), attempting to skim utilizing the HOSS Barge and five Fast Response Units, with a total derated skimming capacity of 64,255 barrels. Temporary storage associated with skimming equipment equals 4,900 barrels. If additional storage is needed, three 23,000 barrel storage barges may be mobilized and centrally located to provide temporary storage allowing the skimmers to stay in the area of operations as much as possible. **Safety is first priority. Air monitoring will be accomplished and operations deemed safe prior to any containment/skimming attempts.**

If the spill went unabated, shoreline impact in Plaquemines Parish, Louisiana would depend upon existing environmental conditions. Shoreline protection would include the use of CGA's near shore and shallow water skimmers with a totaled derated skimming capacity of 13,253 barrels. Temporary storage associated with skimming equipment equals 256 barrels. If additional storage is needed, a 20,000 barrel storage barge may be mobilized and centrally located to provide temporary storage allowing the skimmers to stay in the area of operations as much as possible. Onshore response may include the deployment of shoreline boom on beach areas, or protection and sorbent boom on vegetated areas. Master Service Agreements with OMI Environmental and Garner Environmental will ensure access to 132,000 feet of 18" shoreline protection boom. **Figure 2** outlines individual times needed for procurement, load out, travel time to the site and deployment. Strategies would be based upon surveillance and real time trajectories that depict areas of potential impact given actual sea and weather conditions. The State of Louisiana Initial Oil Spill Response Plan for Plaquemines Parish and Unified Command would be consulted to ensure that environmental and special economic resources would be correctly identified and prioritized to ensure optimal protection. Shoreline protection strategies depict the protection response modes applicable for oil spill clean-up operations. The State of Louisiana Initial Oil Spill Response Plan provides detailed shoreline protection strategies for this area, and it describes necessary action to keep the oil spill from entering Louisiana's coastal wetlands, based on the assumption that removal of the released oil will be much easier and less damaging to fragile coastal ecosystems if done in the open waters of the Gulf of Mexico. Supervisory personnel have the option to modify the deployment and operation of equipment allowing a more effective response to site-specific circumstances. Apache Corporation's contract Spill Management Team holds a copy of the State of Louisiana Initial Oil Spill Response Plan.

Based on the anticipated worst case discharge scenario, Apache Corporation can be onsite with contracted oil spill recovery equipment with adequate response capacity to contain and recover surface hydrocarbons, and prevent land impact, to the maximum extent practicable, within an estimated 44 hours (based on the equipment's Effective Daily Recovery Capacity (EDRC)).

Initial Response Considerations

Actual actions taken during an oil spill response will be based on many factors which include but are not limited to:

- Weather
- Equipment and materials availability
- Ocean currents and tides
- Location of the spill
- Product spilled
- Amount spilled
- Environmental risk assessments
- Trajectory and product analysis
- Well status, i.e., shut in or continual release

Apache Corporation will take action to provide a safe, aggressive response to contain and recover as much of the spilled oil as quickly as it is safe to do so. In an effort to protect the environment, response actions will be designed to provide an “in-depth” protection strategy meant to recover as much oil as possible as far from environmentally sensitive areas as possible. Safety will take precedence over all other considerations during these operations.

Upon notification of a spill, the following actions will be taken:

- Information will be confirmed
- An assessment will be made and initial objectives set
- OSROs and appropriate agencies will be notified
- ICS 201, Initial Report Form will be completed
- Initial Safety plan will be written and published
- Unified Command will be established
 - Overall safety plan developed to reflect the operational situation and coordinated objectives
 - Areas of responsibility established for Source Control and each surface operational site
 - On-site command and control established

Offshore Response Actions

Equipment Deployment

Surveillance

- Surveillance Aircraft will be deployed within two hours of Qualified Individual (QI) notification, or at first light
- Provide trained observer to provide on site status reports
- Provide command and control platform at the site if needed
- Continual surveillance of oil movement by remote sensing systems, aerial photography and visual confirmation
- Continual monitoring of vessel assets using vessel monitoring systems

Dispersant application assets

- Put Airborne Support Inc. (ASI) on standby
- With the Federal On-Scene Coordinator (FOSC), conduct analysis to determine appropriateness of dispersant application
- Gain FOSC approval for use of dispersants on the surface
- Deploy aircraft in accordance with a plan developed for the actual situation
- Coordinate movement of dispersants, aircraft, and support equipment and personnel
- Confirm dispersant availability for current and long range operations
- Start ordering dispersant stocks required for expected operations

Containment boom

- Call out early and expedite deployment to be on scene ASAP
- Ensure boom handling and mooring equipment is deployed with boom
- Provide continuing reports to vessels to expedite their arrival at sites that will provide for their most effective containment
- Use Vessels of Opportunity (VOO) to deploy and maintain boom

Dedicated off-shore skimming systems

General

- Deployed to the highest concentration of oil
- Assets deployed at safe distance from aerial dispersant and in-situ burn operations

CGA HOSS Barge

- Use in areas with heaviest oil concentrations
- Consider for use in areas of known debris (seaweed, and other floating materials)

CGA FRUs

- To the area of the thickest oil
- Use as far off-shore as allowed
- VOOs 140' – 180' in length
- VOOs with minimum of 18' x 38' or 23' x 50' of optimum deck space

Storage Vessels

- Establish availability of CGA contracted assets
- Early call out (to allow for tug boat acquisition and deployment speeds)
- Phase mobilization to allow storage vessels to arrive at the same time as skimming systems
- Position as closely as possible to skimming assets to minimize offloading time

Vessels of Opportunity (VOO)

- Use Apache Corporation's contracted resources as applicable
- Industry vessels are usually best for deployment of Vessel of Opportunity Skimming Systems (VOSS)
- Acquire additional resources as needed
- Consider use of local assets, i.e. fishing and pleasure craft
- Expect mission specific and safety training to be required
- Plan with the US Coast Guard for vessel inspections

In-situ Burn assets

- Determine appropriateness of in-situ burn operation in coordination with the FOSC and affected State On-Scene Coordinator (SOSC)
- Determine availability of fire boom and selected ignition systems
- Start ordering fire boom stocks required for expected operations
- Contact boom manufacturer to provide training if required
- Determine assets to perform on water operation
- Build operations into safety plan
- Conduct operations in accordance with an approved plan

Near Shore Response Actions

Timing

- Place near shore assets on standby and deploy in accordance with planning based on the actual situation, actual trajectories and oil budgets
- VOO identification and training in advance of spill nearing shoreline if possible
- Outfitting of VOOs for specific missions
- Deployment of assets based on actual movement of oil

Considerations

- Water depth, vessel draft
- Shoreline gradient
- State of the oil
- Use of VOOs
- Distance of surf zone from shoreline

Equipment Deployment

Surveillance

- Provide trained observer to direct skimming operations
- Continual surveillance of oil movement by remote sensing systems, aerial photography and visual confirmation
- Continual monitoring of vessel assets

Dispersant Use

- Generally will not be approved within 3 miles of shore or with less than 10 meters of water depth
- Approval would be at Regional Response Team level (Region 6)

Vessel Deployment

Dedicated Near Shore skimming systems

- Fast Response Vessels (FRV)
- Egmpol and Marco Shallow Water Skimmer (SWS)
- Operate with aerial spotter directing systems to observed oil slicks

VOO

- Use Apache Corporation's contracted resources as applicable
- Industry vessels are usually best for deployment of Vessel of Opportunity Skimming Systems (VOSS)
- Acquire additional resources as needed
- Consider use of local assets, i.e. fishing and pleasure craft
- Expect mission specific and safety training to be required
- Plan with the US Coast Guard for vessel inspections
- Operate with aerial spotter directing systems to oil patches

Shoreline Protection Operations

Response Planning Considerations

- Environmental risk assessments (ERA) to determine priorities for area protection
- Time to acquire personnel and equipment and their availability
- Previous contingency planning contained in the appropriate Area Contingency Plan, and currently for Louisiana, The State of Louisiana Initial Oil Spill Response Plan, Deep Water Horizon, dated 2 May 2010

Actions

Placement of boom

- Position boom in accordance with the ERA based on the actual situation or the appropriate ACP
- Assess timing of booming operations to ensure it is where it needs to be at time of impact. Consider:
 - Trajectories
 - Weather forecast
 - Oil Impact forecast
 - Verified spill movement
 - Boom, manpower and vessel (shallow draft) availability
 - Near shore boom and support material, (stakes, anchors, line)

Beach Preparation

Considerations and Actions

- Use of a 10 mile go/no go line to determine timing of beach cleaning
- Shoreline Cleanup and Assessment Team Reports and recommendations
- Determination of Archeological sites and gaining authority to enter
- Monitoring of tide tables and weather to determine extent of high tides
- Pre cleaning of beaches by moving waste above high tide lines to minimize waste
- Staging of equipment and housing of response personnel as close to the job site as possible to maximize on-site work time
- Boom tending, repair, replacement and security (use of local assets may be advantageous)
- Constant awareness of weather and oil movement for resource redeployment as necessary
- In-situ burn may be considered when marshes have been impacted
- Passive clean up of marshes should be considered and appropriate stocks of sorbent boom and/or sweep obtained
- Earthen berms and shoreline protection boom may be considered to protect sensitive inland areas

Decanting Strategy

Recovered oil and water mixtures will typically separate into distinct phases when left in a quiescent state. When separation occurs, the relatively clean water phase can be siphoned or decanted back to the recovery point with minimal, if any, impact. Decanting therefore increases the effective on-site oil storage capacity and equipment operating time. FOSC/SOSC approval will be requested prior to decanting operations. This practice is routinely used for oil spill recovery.

CGA Equipment Limitations

The capability for any spill response equipment, whether a dedicated or portable system, to operate in differing weather conditions will be directly in relation to the capabilities of the vessel the system is placed on. Most importantly, however, the decision to operate will be based on the judgment of the Unified Command and/or the Captain of the vessel, who will ultimately have the final say in terminating operations. Skimming equipment listed below may have operational limits which exceed those safety thresholds. As was seen in the Deepwater Horizon (DWH) oil spill response, vessel skimming operations ceased when seas reached 5-6 feet and vessels were often recalled to port when those conditions were exceeded. Systems below are some of the most up-to-date systems available and were employed during the DWH spill.

Boom	3 foot seas, 20 knot winds
Dispersants	Winds more than 25 knots Visibility less than 3 nautical miles Ceiling less than 1,000 feet.
FRU	8 foot seas
HOSS Barge/OSRB	8 foot seas
Koseq Arms	8 foot seas
OSRV	4 foot seas

Environmental Conditions in the GOM

Louisiana is situated between the easterly and westerly wind belts, and therefore, experiences westerly winds during the winter and easterly winds in the summer. Average wind speed is generally 14-15 mph along the coast. Wave heights average 4 and 5 feet. However, during hurricane season, Louisiana has recorded wave heights ranging from 40 to 50 feet high and winds reaching speeds of 100 mph. Because much of southern Louisiana lies below sea level, flooding is prominent.

Surface water temperature ranges between 70 and 80 °F during the summer months. During the winter, the average temperature will range from 50 and 60 °F.

The Atlantic and Gulf of Mexico hurricane season is officially from 1 June to 30 November. 97% of all tropical activity occurs within this window. The Atlantic basin shows a very peaked season from August through October, with 78% of the tropical storm days, 87% of the minor (Saffir-Simpson Scale categories 1 and 2) hurricane days, and 96% of the major (Saffir-Simpson categories 3, 4 and 5) hurricane days occurring then. Maximum activity is in early to mid September. Once in a few years there may be a hurricane occurring "out of season" - primarily in May or December. Globally, September is the most active month and May is the least active month.

**FIGURE 1
TRAJECTORY BY LAND SEGMENT**

Trajectory of a spill and the probability of it impacting a land segment have been projected utilizing Apache Corporation's WCD and information in the BSEE Oil Spill Risk Analysis Model (OSRAM) for the Central and Western Gulf of Mexico available on the BSEE website using 10 day impact. The results are tabulated below.

Area/Block	OCS-G	Launch Area	Land Segment and/or Resource	Conditional Probability (%) within 10 days
Drill and Complete 5 wells MP 295, Well A <i>21.47 miles from shore</i>	G32263	C53	Lafourche, LA Plaquemines, LA St. Bernard, LA Hancock & Harrison, MS Jackson, MS Mobile, AL Baldwin, AL Escambia, FL	1 25 9 1 2 2 2 1

WCD Scenario- BASED ON WELL BLOWOUT DURING DRILLING OPERATIONS (21.47 miles from shore)
 18,845 bbls of condensate (Volume considering natural weathering)
 API Gravity 46°

FIGURE 2 – Equipment Response Time to MP 295, Well A

<i>Dispersants/Surveillance</i>									
Dispersant/Surveillance	Dispersant Capacity (gal)	Storage Capacity	Persons Req.	From	Hrs to Procure	Hrs to Loadout	Travel to site	Total Hrs	
Basler 67T	2000	NA	2	Houma	1	1	0.6	2.6	
DC 3	1200	NA	2	Houma	1	1	0.8	2.8	
DC 3	1200	NA	2	Houma	1	1	0.8	2.8	
Aero Commander	NA	NA	2	Houma	1	1	0.6	2.6	

Offshore Response

Offshore Equipment No	EDRC	Storage Capacity	VOO	Persons Required	From	Hrs to Procure	Hrs to Loadout	Hrs to GOM	Travel to Spill Site	Hrs to Deploy	Total Hrs
HOSS Barge	43000	4000	3 Tugs	8	Harvey	7	0	5	6.6	1	19.6
CGA											
Enterprise Marine Services LLC (available through contract with CGA)											
CTCo 2607	NA	23000	1 Tug	6	Amelia	4	12	4	22.25	1	43.25
CTCo 2608	NA	23000	1 Tug	6	Amelia	4	12	4	22.25	1	43.25
CTCo 2609	NA	23000	1 Tug	6	Amelia	4	12	4	22.25	1	43.25

Staging Area: Venice

Offshore Equipment With Staging	EDRC	Storage Capacity	VOO	Persons Req.	From	Hrs to Procure	Hrs to Loadout	Travel to Staging	Travel to Site	Hrs to Deploy	Total Hrs
CGA											
FRU (1) + 100 bbl Tank (1)	4251	100	1 Utility	6	Harvey	1	2	1.5	4.3	1	9.8
FRU (2) + 100 bbl Tank (4)	8502	400	2 Utility	12	Venice	1	2	0	4.3	1	8.3
FRU (2) + 100 bbl Tank (4)	8502	400	2 Utility	12	Leeville	1	2	3.5	4.3	1	11.8
42" Auto Boom (5000')	NA	NA	10 Crew	20	Galveston	1	2	8	4.3	1	16.3
42" Auto Boom (1000')	NA	NA	20 Crew	40	Harvey	1	2	1.5	4.3	1	9.8
42" Auto Boom (2500')	NA	NA	6 Crew	12	Ingleside	1	2	11	4.3	1	19.3
42" Auto Boom (5000')	NA	NA	10 Crew	20	Lake Charles	1	2	5.5	4.3	1	13.8
42" Auto Boom (2500')	NA	NA	6 Crew	12	Pascagoula	1	2	4	4.3	1	12.3

Nearshore Response

Nearshore Equipment No Staging	EDRC	Storage Capacity	VOO	Persons Required	From	Hrs to Procure	Hrs to Loadout	Hrs to GOM	Travel to Spill Site	Hrs to Deploy	Total Hrs
Enterprise Marine Services LLC (available through contract with CGA)											
CTCo 2604	NA	20000	1 Tug	6	Amelia	4	12	4	15.63	1	36.63

Staging Area: Venice

Nearshore and Inland Skimmers With Staging	EDRC	Storage Capacity	VOO	Persons Req.	From	Hrs to Procure	Hrs to Loadout	Travel to Staging	Travel to Deployment	Hrs to Deploy	Total Hrs
CGA											
SWS Egmopol	3000	100	NA	3	Galveston	1	2	8	2	0	13
SWS Egmopol	3000	100	NA	3	Houma	1	2	3	2	0	8
SWS Marco	3588	34	NA	3	Houma	1	2	3	2	0	8
SWS Marco	3588	20	NA	3	Lake Charles	1	2	5.5	2	0	10.5
Rope Mop	77	2	0	3	Belle Chasse	1	2	2	2	0	7

Shoreline Protection

Staging Area: Venice

Shoreline Protection Boom	VOO	Persons Req.	Storage/Warehouse Location	Hrs to Procure	Hrs to Load Out	Travel to Staging	Travel to Deployment	Hrs to Deploy	Total Hrs
Garner (available through MSA)									
13,000' 18" Boom	3 Crew	4	Deer Park	1	1	7.5	2	4	15.5
34,000' 18" Boom	5 Crew	8	Port Arthur	1	1	6.25	2	8	18.25
OMI Environmental (available through MSA)									
10,000' 18" Boom	4 Crew	10	New Iberia, LA	1	1	4	2	3	11
10,000' 18" Boom	4 Crew	10	Houston, TX	1	1	7.5	2	3	14.5
10,000' 18" Boom	4 Crew	10	Port Arthur, TX	1	1	6.25	2	3	13.25
20,000' 18" Boom	8 Crew	20	Belle Chasse, LA	1	1	1.75	2	6	11.75
10,000' 18" Boom	4 Crew	10	Port Allen, LA	1	1	3.5	2	3	10.5
10,000' 18" Boom	4 Crew	10	Houma, LA	1	1	3.5	2	3	10.5
15,000' 18" Boom	6 Crew	14	Gretna, LA (Warehouse)	2	2	2	2	4	12

Beach Boom	EDRC	Storage Capacity	VOO	Persons Req.	From	Hrs to Procure	Hrs to Loadout	Travel to Staging	Travel to Deployment	Hrs to Deploy	Total Hrs
CGA											
Beach Boom (2000')	NA	NA	NA	6	Galveston	1	2	8	1	2	14
Beach Boom (1000')	NA	NA	NA	4	Ingleside	1	2	11	1	2	17
Beach Boom (2000')	NA	NA	NA	6	Pascagoula	1	2	4	1	2	10

Wildlife Response	EDRC	Storage Capacity	VOO	Persons Req.	From	Hrs to Procure	Hrs to Loadout	Travel to Staging	Travel to Deployment	Hrs to Deploy	Total Hrs
Wildlife Support Trailer	NA	NA	NA	2	Houma	1	2	3	1	2	9
Bird Scare Guns (24)	NA	NA	NA	2	Belle Chasse	1	2	2	1	2	8
Bird Scare Guns (12)	NA	NA	NA	2	Galveston	1	2	8	1	2	14
Bird Scare Guns (24)	NA	NA	NA	2	Houma	1	2	3	1	2	9
Bird Scare Guns (12)	NA	NA	NA	2	Ingleside	1	2	11	1	2	17
Bird Scare Guns (24)	NA	NA	NA	2	Lake Charles	1	2	5.5	1	2	11.5
Bird Scare Guns (24)	NA	NA	NA	2	Pascagoula	1	2	4	1	2	10

CGA

Response Asset	Total
Offshore EDRC	64,255
Offshore Recovered Oil Storage	73,900
Nearshore / Shallow Water EDRC	13,253
Nearshore / Shallow Water Recovered Oil Storage	20,256

SECTION I
ENVIRONMENTAL MONITORING INFORMATION
(30 CFR 250.221 AND 250.252)

A. MONITORING SYSTEMS

There are no environmental monitoring systems currently in place or planned for the proposed activities.

B. INCIDENTAL TAKES

There is no reason to believe that any of the endangered species or marine mammals as listed in the ESA will be incidentally taken as a result of the operations proposed under this plan.

C. FLOWER GARDEN BANKS NATIONAL MARINE SANCTUARY

Main Pass Block 295 is not located in the Flower Garden Banks National Marine Sanctuary; therefore, the requested information is not required in this EP.

SECTION J
LEASE STIPULATIONS INFORMATION
(30 CFR 250.222 and 250.253)

Oil and gas exploration activities on the OCS are subject to stipulations developed before the lease sale and would be attached to the lease instrument, as necessary, in the form of mitigating measures. The BOEM is responsible for ensuring full compliance with stipulations.

Exploration activities are subject to the following stipulations attached to Lease OCS-G 32263, Main Pass Block 295.

Marine Protected Species

Lease Stipulation No. 8 is meant to reduce the potential taking of marine protected species. Apache will operate in accordance with NTL 2007-G04, to minimize the risk of vessel strikes to protected species and report observations of injured or dead protected species, and the prevention of intentional and/or accidental introduction of debris into the marine environment.

SECTION K
ENVIRONMENTAL MITIGATION MEASURES INFORMATION
(30 CFR 250.224 and 250.257)

A. MEASURES TAKEN TO AVOID, MINIMIZE, AND MITIGATE IMPACTS

Activities in this Exploration Plan do not impact the State of Florida.

B. INCIDENTAL TAKES

There is no reason to believe that the protected species may be incidentally taken by the proposed activities.

Apache Corporation will adhere to the requirements as set forth in the following documents, as applicable, to avoid or minimize impacts to any of the species listed in the ESA as a result of the operations conducted herein:

- NTL 2007-G04, "Vessel Strike Avoidance and Injured/Dead Protected Species Reporting"
- NTL 2007-G03, "Marine Trash and Debris Awareness and Elimination"
- NTL 2007-G02, "Implementation of Seismic Survey Mitigation Measures and Protected Species Observer Program"

SECTION L SUPPORT VESSELS AND AIRCRAFT INFORMATION (30 CFR 250.224 and 250.257)

A. GENERAL

Apache will travel the most practical, direct route from the shorebase to Main Pass Block 295 as permitted by weather and traffic conditions.

Type	Maximum Fuel Tank Capacity	Maximum Number in Area at Any Time	Trip Frequency or Duration
Tug Boats	3000 bbls	2	As needed
Crew Boat	400 bbls	1	3/week
Supply Boat	2380 bbls	1	3/week
Helicopter	760 gallons	1	As Needed

B. DIESEL OIL SUPPLY VESSELS

Not required

C. DRILLING FLUID TRANSPORTATION

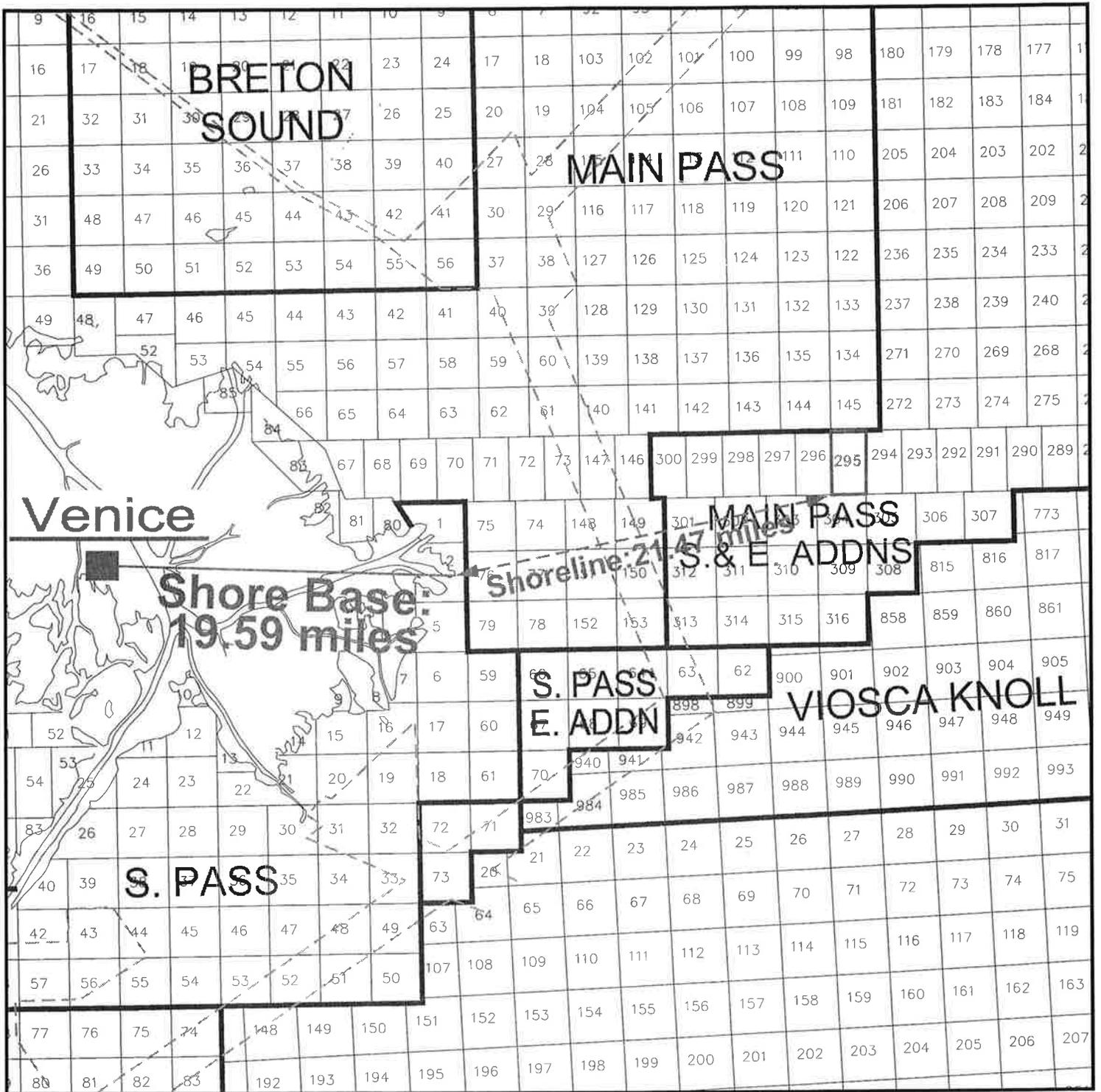
Not required

D. SOLID AND LIQUID WASTE TRANSPORTATION

Not required

E. VICINITY MAP

A vicinity map showing the location of the proposed activities relative to the shoreline, the distance of the proposed activities from the shoreline and the support base, and the primary route of the support vessels and aircraft that will be used when traveling between the onshore support facilities is included as **Attachment L-1**.



Attachment L-1

 APACHE <small>CORPORATION</small> <small>GULFCOAST REGION</small>	
MAIN PASS 295 OFFSHORE LOUISIANA DOCD Proposed Well Locations #A, B, C, D & E Vicinity Location	
CONTOUR INTERVAL:	DATE: 05-30-12
INTERPRETATION BY:	DRAFTED BY: LH
SCALE: 1"=40,000'	APPROVED BY: N/A
AREA: Main Pass	FILE: mp295_docd_vicnty_map.dwg

<p>SECTION M ONSHORE SUPPORT FACILITIES INFORMATION (30 CFR 250.225 and 250.258)</p>
--

A. GENERAL

Provided in the table below is a list of the onshore facilities that will be used to provide supply and service support for the proposed activities:

Name	Location	Existing/New/Modified
Venice Shorebase	Venice, LA	Existing

B. SUPPORT BASE CONSTRUCTION OR EXPANSION

Apache does not propose any land acquisitions for the construction of an onshore support base, nor will we expand the existing shorebase as a result of the operations proposed in this Exploration Plan.

C. SUPPORT BASE CONSTRUCTION OR EXPANSION TIMETABLE

Not required

D. WASTE DISPOSAL

Provide information in the table below on the onshore facilities you will use to store and dispose of any solid and liquid wastes generated by the proposed activities.

See attached table.

TABLE 2. WASTES YOU WILL TRANSPORT AND /OR DISPOSE OF ONSHORE

please specify whether the amount reported is a total or per well

Projected generated waste		Solid and Liquid Wastes transportation		Waste Disposal	
Type of Waste	Composition	Transport Method	Name/Location of Facility	Amount	Disposal Method
Will drilling occur? If yes, fill in the muds and cuttings.					
EXAMPLE: Synthetic-based drilling fluid or mud	internal olefin, ester	Below deck storage tanks on offshore support vessels	Newport Environmental Services Inc., Ingleside, TX	X bbl/well	Recycled
Oil-based drilling fluid or mud	NA				
Synthetic-based drilling fluid or mud	NA				
Cuttings wetted with Water-based fluid	NA				
Cuttings wetted with Synthetic-based fluid	NA				
Cuttings wetted with oil-based fluids	NA				
Will you produce hydrocarbons? If yes fill in for produced sand.					
Produced sand	NA				
Will you have additional wastes that are not permitted for discharge? If yes, fill in the appropriate rows.					
EXAMPLE: trash and debris (recyclables)	Plastic, paper, aluminum plastic paper cans	barged in a storage bin bag in compactor bag	ARC, New Iberia, LA	X lb/well	Recycled
Used oil	cooking oil, engine oil	enviromental drum / tote tank	Venice, LA	1000 cu/ft /mth	Recycled
Completion Fluid	ZNBR2	enviromental drum / tote tank	Venice, LA	500gal / mth	Recycled
				200bbl/well	Recycled

NOTE: if you will not have a type of waste, enter NA in the row.

SECTION N
COASTAL ZONE MANAGEMENT (CZMA) INFORMATION
(30 CFR 250.226 and 250.260)

Under the direction of the Coastal Zone Management Act (CZMA), the states of Alabama, Florida, Louisiana, Mississippi and Texas developed Coastal Zone Management Programs (CZMP) to allow for the supervision of significant land and water use activities that take place within or that could significantly impact their respective coastal zones.

Relevant enforceable policies were considered in certifying consistency for Louisiana and Mississippi.

A certificate of Coastal Zone Management Consistency for the state of Louisiana is enclosed as **Attachment N-1**.

As authorized by the Federal Coastal Zone Management Act (CZMA), The State of Mississippi developed a Coastal Management Program (CMP) to allow for the review of proposed Federal license and permit activities affecting any coastal use or resources, in or outside of the Mississippi Coastal Zone.

The OCS related oil and gas exploratory and development activities having potential impact on the Mississippi Coastal Zone are based on the location of the proposed facilities, access to those sites, best practical techniques for drilling locations, drilling equipment guidelines for the prevention of adverse environmental effects, effective environmental protection, emergency plans and contingency plans.

Below are goals identified by the State of Mississippi and our comments and/or corresponding cross references:

Mississippi Coastal Program (MCP) Enforceable Policies

Goal 1: To provide for reasonable industrial expansion in the coastal area and to ensure the efficient utilization of waterfront industrial sites so that suitable sites are conserved for water dependent industry.

The activities proposed in this plan are based out of Venice, Louisiana. The activities will not provide any industrial expansion on the coastal area of Mississippi. Therefore Mississippi coastal areas will be conserved for water dependent industry.

Goal 2: To favor the preservation of the coastal wetlands and ecosystems, except where a specific alteration of specific coastal wetlands would serve

a higher public interest in compliance with the public purposes of the public trust in which the coastal wetlands are held.

Goal 2 is addressed in SECTION H, Environmental Impact Analysis. The nearest proposed activities will be 68 miles from the Mississippi coast.

Goal 3: To protect, propagate and conserve the state's seafood and aquatic life in connection with the revitalization of the seafood industry of the State of Mississippi.

Goal 3 is addressed in SECTION H, Environmental Impact Analysis. Little impact to the seafood industry can be expected due to the activities occurring 68 miles from the Mississippi coast.

Goal 4: To conserve the air and waters of the state, and to protect, maintain and improve the quality thereof for public use, for the propagation of wildlife, fish and aquatic life, and for domestic, agricultural, industrial, recreational and other legitimate beneficial uses.

Goal 4 is addressed in SECTION B, General Information, SECTION G, Air Emissions Information, and SECTION H, Environmental Impact Analysis.

Goal 5: To put to beneficial use to the fullest extent of which they are capable the water resources of the state, and to prevent the waste, unreasonable use, or unreasonable method of use of water.

The activities proposed in this plan are based in Venice, Louisiana. As such, Mississippi's water resources should not be impacted by the proposed activities. Activities occurring at the sites in the OCS will be conducted in accordance with Apache's Regional Oil Spill Response Plan referenced in SECTION F of this plan.

Goal 6: To preserve the state's historical and archaeological resources, to prevent their destruction, and to enhance these resources wherever possible.

Goal 6 is addressed in SECTION B, General Information, and SECTION H, Environmental Impact Analysis.

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Goal 7: To encourage the preservation of natural scenic qualities in the coastal area.

Goal 7 is addressed in SECTION E, Waste Discharges Information, SECTION F, Oil Spill Information, SECTION G, Air Emissions Information, and SECTION H, Environmental Impact Analysis.

Goal 8: To assist local governments in the provision of public facilities services in a manner consistent with the coastal program.

As the proposed activities are located 68 miles from the Mississippi coast and are based out of a shorebase in Venice, Louisiana, local governments should not be affected.

**COASTAL ZONE MANAGEMENT
CONSISTENCY CERTIFICATION**

INITIAL EXPLORATION PLAN

MAIN PASS BLOCK 295

LEASE OCS-G 32263

The proposed activities described in detail in this OCS Plan comply with Louisiana's approved Coastal Management Program and will be conducted in a manner consistent with such Program

Apache Corporation
Lessee or Operator



Certifying Official



Date

SECTION O
ENVIRONMENTAL IMPACT ANALYSIS (EIA)
(30 CFR 250.227 and 250.261)

Apache Corporation

Initial Exploration Plan Main Pass Block 295 OCS-G 32263

(A) IMPACT PRODUCING FACTORS ENVIRONMENTAL IMPACT ANALYSIS WORKSHEET

Environment Resources	Impact Producing Factors (IPFs) Categories and Examples Refer to recent GOM OCS Lease Sale EIS for a more complete list of IPFs					
	Emissions (air, noise, light, etc.)	Effluents (muds, cutting, other discharges to the water column or seafloor)	Physical disturbances to the seafloor (rig or anchor emplacements, etc.)	Wastes sent to shore for treatment or disposal	Accidents (e.g., oil spills, chemical spills, H ₂ S releases)	Discarded Trash & Debris
Site-specific at Offshore Location						
Designated topographic features		(1)	(1)		(1)	
Pinnacle Trend area live bottoms		(2)	(2)		(2)	
Eastern Gulf live bottoms		(3)	(3)		(3)	
Benthic communities			(4)			
Water quality		X	X		X	
Fisheries		X	X		X	
Marine Mammals	X(8)	X			X(8)	X
Sea Turtles	X(8)	X			X(8)	X
Air quality	X(9)					
Shipwreck sites (known or potential)			(7)			
Prehistoric archaeological sites			X(7)			
Vicinity of Offshore Location						
Essential fish habitat		X	X		X(6)	
Marine and pelagic birds	X				X	X
Public health and safety					(5)	
Coastal and Onshore						
Beaches					X(6)	X
Wetlands					X(6)	
Shore birds and coastal nesting birds					X(6)	X
Coastal wildlife refuges					X	
Wilderness areas					X	

Footnotes for Environmental Impact Analysis Matrix

- 1) Activities that may affect a marine sanctuary or topographic feature. Specifically, if the well or platform site or any anchors will be on the seafloor within the:
 - 4-mile zone of the Flower Garden Banks, or the 3-mile zone of Stetson Bank;
 - 1000-m, 1-mile or 3-mile zone of any topographic feature (submarine bank) protected by the Topographic Features Stipulation attached to an OCS lease;
 - Essential Fish Habitat (EFH) criteria of 500 ft. from any no-activity zone; or
 - Proximity of any submarine bank (500 ft. buffer zone) with relief greater than 2 meters that is not protected by the Topographic Features Stipulation attached to an OCS lease.
- 2) Activities with any bottom disturbance within an OCS lease block protected through the Live Bottom (Pinnacle Trend) Stipulation attached to an OCS lease.
- 3) Activities within any Eastern Gulf OCS block where seafloor habitats are protected by the Live Bottom (Low-Relief) Stipulation attached to an OCS lease.
- 4) Activities on blocks designated by the BOEM as being in water depths 300 meters or greater.
- 5) Exploration or production activities where H₂S concentrations greater than 500 ppm might be encountered.
- 6) All activities that could result in an accidental spill of produced liquid hydrocarbons or diesel fuel that you determine would impact these environmental resources. If the proposed action is located a sufficient distance from a resource that no impact would occur, the EIA can note that in a sentence or two.
- 7) All activities that involve seafloor disturbances, including anchor emplacements, in any OCS block designated by the BOEM as having high-probability for the occurrence of shipwrecks or prehistoric sites, including such blocks that will be affected that are adjacent to the lease block in which your planned activity will occur. If the proposed activities are located a sufficient distance from a shipwreck or a prehistoric site that no impact would occur, the EIA can note that in a sentence or two.
- 8) All activities that you determine might have an adverse effect on endangered or threatened marine mammals or sea turtles or their critical habitats.
- 9) Production activities that involve transportation of produced fluids to shore using shuttle tankers or barges.

(B) ANALYSIS

Site-Specific at Main Pass Block 295

Proposed operations consist of the drilling and completion of five (5) locations. Operations will be conducted with a Jack-up rig.

1. Designated Topographic Features

Potential IPFs on topographic features include physical disturbances to the seafloor, effluents, and accidents.

Physical disturbances to the seafloor: Main Pass Block 295 is 69 miles from the closest designated Topographic Features Stipulation Block (Sackett Bank); therefore, no adverse impacts are expected.

Effluents: Main Pass Block 295 is 69 miles from the closest designated Topographic Features Stipulation Block (Sackett Bank); therefore, no adverse impacts are expected.

Accidents: It is unlikely that an accidental surface or subsurface spill would occur from the proposed activities (refer to statistics in **Item 5, Water Quality**). Oil spills cause damage to benthic organisms only if the oil contacts the organisms. Oil from a surface spill can be driven into the water column; measurable amounts have been documented down to a 10 m depth. At this depth, the oil is found only at concentrations several orders of magnitude lower than the amount shown to have an effect on corals. Because the crests of topographic features in the Northern Gulf of Mexico are found below 10 m, no oil from a surface spill could reach their sessile biota. Oil from a subsurface spill is not applicable due to the distance of these blocks from a topographic area. The activities proposed in this plan will be covered by Apache Corporation's Regional OSRP (refer to information submitted in **Appendix H**).

There are no other IPFs (including emissions and wastes sent to shore for disposal) from the proposed activities, which could impact topographic features.

2. Pinnacle Trend Area Live Bottoms

Potential IPFs on pinnacle trend area live bottoms include physical disturbances to the seafloor, effluents, and accidents.

Physical disturbances to the seafloor: Main Pass Block 295 is 8.6 miles from the closest live bottom (pinnacle trend) area; therefore, no adverse impacts are expected.

Effluents: Main Pass Block 295 is 8.6 miles from the closest live bottom (pinnacle trend) area; therefore, no adverse impacts are expected.

Accidents: It is unlikely that an accidental surface or subsurface spill would occur from the proposed activities (refer to statistics in **Item 5**, Water Quality). Oil spills have the potential to foul benthic communities and cause lethal and sublethal effects on live bottom organisms. Oil from a surface spill can be driven into the water column; measurable amounts have been documented down to a 10 m depth. At this depth, the oil is found only at concentrations several orders of magnitude lower than the amount shown to have an effect on marine organisms. Oil from a subsurface spill is not applicable due to the distance of these blocks from a live bottom (pinnacle trend) area. The activities proposed in this plan will be covered by Apache Corporation's Regional OSRP (refer to information submitted in **Appendix H**).

There are no other IPFs (including emissions and wastes sent to shore for disposal) from the proposed activities which could impact a live bottom (pinnacle trend) area.

3. Eastern Gulf Live Bottoms

Potential IPFs on Eastern Gulf live bottoms include physical disturbances to the seafloor, effluents, and accidents.

Physical disturbances to the seafloor: Main Pass Block 295 is not located in an area characterized by the existence of live bottoms, and this lease does not contain a Live-Bottom Stipulation requiring a photo documentation survey and survey report.

Effluents: Main Pass Block 295 is not located in an area characterized by the existence of live bottoms; therefore, no adverse impacts are expected.

Accidents: It is unlikely that an accidental surface or subsurface spill would occur from the proposed activities (refer to statistics in **Item 5**, Water Quality). Oil spills cause damage to live bottom organisms only if the oil contacts the organisms. Oil from a surface spill can be driven into the water column; measurable amounts have been documented down to a 10 m depth. At this depth, the oil is found only at concentrations several orders of magnitude lower than the amount shown to have an effect on marine invertebrates. Oil from a subsurface spill is not applicable due to the distance of these blocks from a live bottom area. The activities proposed in this plan will be covered by Apache Corporation's Regional OSRP (refer to information submitted in **Appendix H**).

There are no other IPFs (including emissions and wastes sent to shore for disposal) from the proposed activities which could impact an Eastern Gulf live bottom area.

4. Benthic Communities

There are no IPFs (including emissions, physical disturbances to the seafloor, wastes sent to shore for disposal, or accidents) from the proposed activities that could cause impacts to benthic communities.

Operations proposed in this plan are in water depths of 216-219 feet. High-density benthic communities are found only in water depths greater than 984 feet (300 meters); therefore, Apache Corporation's proposed operations in Main Pass Block 295 would not cause impacts to benthic communities.

5. Water Quality

IPFs that could result in water quality degradation from the proposed operations in Main Pass Block 295 include disturbances to the seafloor, effluents and accidents.

Physical disturbances to the seafloor: Bottom area disturbances resulting from the emplacement of drill rigs, the drilling of wells and the installation of platforms and pipelines would increase water-column turbidity and re-suspension of any accumulated pollutants, such as trace metals and excess nutrients. This would cause short-lived impacts on water quality conditions in the immediate vicinity of the emplacement operations.

Effluents: Levels of contaminants in drilling muds and cuttings and produced water discharges, discharge-rate restrictions and monitoring and toxicity testing are regulated by the EPA NPDES permit, thereby eliminating many significant biological or ecological effects. Operational discharges are not expected to cause significant adverse impacts to water quality.

Accidents: Oil spills have the potential to alter offshore water quality; however, it is unlikely that an accidental surface or subsurface spill would occur from the proposed activities. Between 1980 and 2000, OCS operations produced 4.7 billion barrels of oil and spilled only 0.001 percent of this oil, or 1 bbl for every 81,000 bbl produced. The spill risk related to a diesel spill from drilling operations is even less. Between 1976 and 1985, (years for which data were collected), there were 80 reported diesel spills greater than one barrel associated with drilling activities. Considering that there were 11,944 wells drilled, this is a 0.7 percent probability of an occurrence. If a spill were to occur, the water quality of marine waters would be temporarily affected by the dissolved components and small oil droplets. Dispersion by currents and microbial degradation would remove the oil from the water column and dilute the constituents to background levels. Historically, changes in offshore water quality from oil spills have only been detected during the life of the spill and up to several months afterwards. Most of the components of oil are insoluble in water and therefore float. The activities proposed in this plan will be covered by Apache Corporation's Regional Oil Spill Response Plan (refer to information submitted in **Appendix H**).

There are no other IPFs (including emissions, physical disturbances to the seafloor, and wastes sent to shore for disposal) from the proposed activities which could cause impacts to water quality.

6. Fisheries

IPFs that could cause impacts to fisheries as a result of the proposed operations in Main Pass Block 295 include physical disturbances to the seafloor, effluents and accidents.

Physical disturbances to the seafloor: The emplacement of a structure or drilling rig results in minimal loss of bottom trawling area to commercial fishermen. Pipelines cause gear conflicts which result in losses of trawls and shrimp catch, business downtime and vessel damage. Most financial losses from gear conflicts are covered by the Fishermen's Contingency Fund (FCF). The emplacement and removal of facilities are not expected to cause significant adverse impacts to fisheries.

Effluents: Effluents such as drilling fluids and cuttings discharges contain components and properties which are detrimental to fishery resources. Moderate petroleum and metal contamination of sediments and the water column can occur out to several hundred meters down-current from the discharge point. Offshore discharges are expected to disperse and dilute to very near background levels in the water column or on the seafloor within 3,000 m of the discharge point, and are expected to have negligible effect on fisheries.

Accidents: An accidental oil spill has the potential to cause some detrimental effects on fisheries; however, it is unlikely that such an event would occur from the proposed activities (refer to **Item 5**, Water Quality). The effects of oil on mobile adult finfish or shellfish would likely be sublethal and the extent of damage would be reduced to the capacity of adult fish and shellfish to avoid the spill, to metabolize hydrocarbons, and to excrete both metabolites and parent compounds. The activities proposed in this plan will be covered by Apache Corporation's Regional OSRP (refer to information submitted in **Appendix H**).

There are no IPFs from emissions, or wastes sent to shore for disposal from the proposed activities which could cause impacts to fisheries.

7. Marine Mammals

GulfCet II studies revealed that cetaceans of the continental shelf and shelf-edge were almost exclusively bottlenose dolphin and Atlantic spotted dolphin. Squid eaters, including dwarf and pygmy killer whale, Risso's dolphin, rough-toothed dolphin, and Cuvier's beaked whale, occurred most frequently along the upper slope in areas outside of anticyclones. IPFs that could cause impacts to marine mammals as a result of the proposed operations in Main Pass Block 295 include emissions, effluents, discarded trash and debris, and accidents.

Emissions: Noises from drilling activities, support vessels and helicopters may elicit a startle reaction from marine mammals. This reaction may lead to disruption of marine mammals' normal activities. Stress may make them more vulnerable to parasites, disease, environmental contaminants, and/or predation (Majors and Myrick, 1990). There is little conclusive evidence for long-term displacements and population trends for marine mammals relative to noise.

Effluents: Drilling fluids and cuttings discharges contain components which may be detrimental to marine mammals. Most operational discharges are diluted and dispersed upon release. Any potential impact from drilling fluids would be indirect, either as a result of impacts on prey items or possibly through ingestion in the food chain (API, 1989).

Discarded trash and debris: Both entanglement in, and ingestion of debris have caused the death or serious injury of marine mammals (Laist, 1997; MMC, 1999). The limited amount of marine debris, if any, resulting from the proposed activities is not expected to substantially harm marine mammals. Operators are prohibited from deliberately discharging debris as mandated by MARPOL-Annex V and the Marine Plastic Pollution Research and Control Act, and regulations imposed by various agencies including the United States Coast Guard (USCG) and the Environmental Protection Agency (EPA).

Apache Corporation will operate in accordance with the regulations and also avoid accidental loss of solid waste items by maintaining waste management plans, manifesting trash sent to shore, and using special precautions such as covering outside trash bins to prevent accidental loss of solid waste. Special caution will be exercised when handling and disposing of small items and packaging materials, particularly those made of non-biodegradable, environmentally persistent materials such as plastic or glass.

Informational placards will be posted on all vessels and facilities having sleeping or food preparation capabilities. All offshore personnel, including contractors and other support services-related personnel (e.g. helicopter pilots, vessel captains and boat crews) will be indoctrinated on waste procedures, and will view the video (or Microsoft PowerPoint presentation), "Think About It" (*previously "All Washed Up: The Beach Litter Problem"*). Thereafter, all personnel will view the marine trash and debris training video annually. Offshore personnel will also receive an explanation from Apache Corporation management or the designated lease operator management that emphasizes their commitment to waste management in accordance with NTL No. 2012-G01.

Accidents: Collisions between support vessels and cetaceans would be unusual events, however should one occur, death or injury to marine mammals is possible. Contract vessel operators can avoid marine mammals and reduce potential deaths by maintaining a vigilant watch for marine mammals and maintaining a safe distance when they are sighted. Vessel crews should use a reference guide to help identify the twenty-eight species of whales and dolphins, and the single species of manatee that may be encountered in the Gulf of Mexico OCS. Vessel crews must report sightings of any injured or dead protected marine mammal species immediately,

regardless of whether the injury or death is caused by their vessel, to the Marine Mammal and Sea Turtle Stranding Hotline at (888) 404-3922, the NMFS Southeast Regional Office at (727) 824-5312, or the Marine Mammal Stranding Network at (305) 862-2850. In addition, if the injury or death was caused by a collision with a contract vessel, the BOEM must be notified within 24 hours of the strike by email to protectedspecies@boemre.gov. If the vessel is the responsible party, it is required to remain available to assist the respective salvage and stranding network as needed.

Oil spills have the potential to cause sublethal oil-related injuries and spill-related deaths to marine mammals. However, it is unlikely that an accidental oil spill would occur from the proposed activities (refer to **Item 5**, Water Quality). Oil spill response activities may increase vessel traffic in the area, which could add to changes in cetacean behavior and/or distribution, thereby causing additional stress to the animals. The effect of oil dispersants on cetaceans is not known. The acute toxicity of oil dispersant chemicals included in Apache Corporation's OSRP is considered to be low when compared with the constituents and fractions of crude oils and diesel products. The activities proposed in this plan will be covered by Apache Corporation's OSRP (refer to information submitted in accordance with **Appendix H**).

There are no other IPFs (including physical disturbances to the seafloor) from the proposed activities which could impact marine mammals.

8. Sea Turtles

IPFs that could cause impacts to sea turtles as a result of the proposed operations include emissions, effluents, discarded trash and debris, and accidents. GulfCet II studies sighted most loggerhead, Kemp's ridley and leatherback sea turtles over shelf waters. Historically these species have been sighted up to the shelf's edge. They appear to be more abundant east of the Mississippi River than they are west of the river (Fritts et al., 1983b; Lohoefer et al., 1990). Deep waters may be used by all species as a transitory habitat.

Emissions: Noise from drilling activities, support vessels, and helicopters may elicit a startle reaction from sea turtles, but this is a temporary disturbance.

Effluents: Drilling fluids and cuttings discharges are not known to be lethal to sea turtles. Most operational discharges are diluted and dispersed upon release. Any potential impact from drilling fluids would be indirect, either as a result of impacts on prey items or possibly through ingestion in the food chain (API, 1989).

Discarded trash and debris: Both entanglement in, and ingestion of, debris have caused the death or serious injury of sea turtles (Balazs, 1985). The limited amount of marine debris, if any, resulting from the proposed activities is not expected to substantially harm sea turtles. Operators are prohibited from deliberately discharging debris as mandated by MARPOL-Annex V and the Marine Plastic Pollution Research and Control Act, and regulations imposed by various agencies

including the United States Coast Guard (USCG) and the Environmental Protection Agency (EPA). Apache Corporation will operate in accordance with the regulations and also avoid accidental loss of solid waste items by maintaining waste management plans, manifesting trash sent to shore, and using special precautions such as covering outside trash bins to prevent accidental loss of solid waste. Special caution will be exercised when handling and disposing of small items and packaging materials, particularly those made of non-biodegradable, environmentally persistent materials such as plastic or glass.

Informational placards will be posted on all vessels and facilities having sleeping or food preparation capabilities. All offshore personnel, including contractors and other support services-related personnel (e.g. helicopter pilots, vessel captains and boat crews) will be indoctrinated on waste procedures, and will view the video (or Microsoft PowerPoint presentation), "Think About It" (*previously "All Washed Up: The Beach Litter Problem"*). Thereafter, all personnel will view the marine trash and debris training video annually. Offshore personnel will also receive an explanation from Apache Corporation management or the designated lease operator management that emphasizes their commitment to waste management in accordance with NTL No. 2012-G01.

Accidents: Collisions between support vessels and sea turtles would be unusual events, however should one occur, death or injury to sea turtles is possible. Contract vessel operators can avoid sea turtles and reduce potential deaths by maintaining a vigilant watch for sea turtles and maintaining a safe distance when they are sighted. Vessel crews should use a reference guide to help identify the five species of sea turtles that may be encountered in the Gulf of Mexico OCS. Vessel crews must report sightings of any injured or dead protected sea turtle species immediately, regardless of whether the injury or death is caused by their vessel, to the Marine Mammal and Sea Turtle Stranding Hotline at (888) 404-3922, the NMFS Southeast Regional Office at (727) 824-5312, or the Marine Mammal Stranding Network at (305) 862-2850. In addition, if the injury or death was caused by a collision with a contract vessel, the BOEM must be notified within 24 hours of the strike by email to protectedspecies@boemre.gov. If the vessel is the responsible party, it is required to remain available to assist the respective salvage and stranding network as needed.

All sea turtle species and their life stages are vulnerable to the harmful effects of oil through direct contact or by fouling of their food. Exposure to oil can be fatal, particularly to juveniles and hatchlings. However, it is unlikely that an accidental oil spill would occur from the proposed activities (refer to **Item 5**, Water Quality). Oil spill response activities may increase vessel traffic in the area, which could add to the possibility of collisions with sea turtles. The activities proposed in this plan will be covered by Apache Corporation's Regional Oil Spill Response Plan (refer to information submitted in accordance with **Appendix H**).

There are no other IPFs (including physical disturbances to the seafloor) from the proposed activities which could impact sea turtles.

9. Air Quality

Main Pass Block 295 is located 35.5 miles from the Breton Wilderness Area and 21.47 miles from shore. Applicable emissions data is included in **Appendix G** of the Plan.

There would be a limited degree of air quality degradation in the immediate vicinity of the proposed activities. Plan Emissions for the proposed activities do not exceed the annual exemption levels as set forth by BOEM. Accidents and blowouts can release hydrocarbons or chemicals, which could cause the emission of air pollutants. However, these releases would not impact onshore air quality because of the prevailing atmospheric conditions, emission height, emission rates, and the distance of Main Pass Block 295 from the coastline. There are no other IPFs (including effluents, physical disturbances to the seafloor, wastes sent to shore for treatment or disposal) from the proposed activities which would impact air quality.

10. Shipwreck Sites (known or potential)

IPFs that could impact known or unknown shipwreck sites as a result of the proposed operations in Main Pass Block 295 include disturbances to the seafloor and accidents (oil spill). Main Pass Block 295 is not located in or adjacent to an OCS block designated by BOEM as having a high probability for occurrence of shipwrecks. Apache Corporation will report to BOEM the discovery of any evidence of a shipwreck and make every reasonable effort to preserve and protect that cultural resource. There are no other IPFs (including emissions, effluents, wastes sent to shore for treatment or disposal, or accidents) from the proposed activities which could impact shipwreck sites.

Accidents: An accidental oil spill has the potential to cause some detrimental effects to shipwreck sites if the release were to occur subsea. However, it is unlikely that an accidental oil spill would occur from the proposed activities (refer to **Item 5**, Water Quality). The activities proposed in this plan will be covered by Apache Corporation's Regional Oil Spill Response Plan (refer to information submitted in accordance with **Appendix H**).

There are no other IPFs (including emissions, effluents, or wastes sent to shore for treatment or disposal) from the proposed activities that could cause impacts to shipwreck sites.

11. Prehistoric Archaeological Sites

IPFs that could cause impacts to prehistoric archaeological sites as a result of the proposed operations in Main Pass Block 295 are physical disturbances to the seafloor and accidents (oil spills).

Physical Disturbances to the seafloor: Main Pass Block 295 is located inside the Archaeological Prehistoric high probability lines. Apache Corporation will report to BOEM the discovery of any object of prehistoric archaeological significance and make every reasonable effort to preserve and protect that cultural resource.

Accidents: An accidental oil spill has the potential to cause some detrimental effects to prehistoric archaeological sites if the release were to occur subsea. However, it is unlikely that an accidental oil spill would occur from the proposed activities (refer to **Item 5**, Water Quality). The activities proposed in this plan will be covered by Apache Corporation's Regional Oil Spill Response Plan (refer to information submitted in accordance with **Appendix H**).

There are no other IPFs (including emissions, effluents, wastes sent to shore for treatment or disposal) from the proposed activities that could cause impacts to prehistoric archaeological sites.

Vicinity of Offshore Location

1. Essential Fish Habitat (EFH)

IPFs that could cause impacts to EFH as a result of the proposed operations in Main Pass Block 295 include physical disturbances to the seafloor, effluents and accidents. EFH includes all estuarine and marine waters and substrates in the Gulf of Mexico.

Physical disturbances to the seafloor: The Live Bottom Low Relief Stipulation, the Live Bottom (Pinnacle Trend) Stipulation, and the Eastern Gulf Pinnacle Trend Stipulation would prevent most of the potential impacts on live-bottom communities and EFH from bottom disturbing activities (e.g., anchoring, structure emplacement and removal).

Effluents: The Live Bottom Low Relief Stipulation, the Live Bottom (Pinnacle Trend) Stipulation, and the Eastern Gulf Pinnacle Trend Stipulation would prevent most of the potential impacts on live-bottom communities and EFH from operational waste discharges. Levels of contaminants in drilling muds and cuttings and produced-water discharges, discharge-rate restrictions, and monitoring and toxicity testing are regulated by the EPA NPDES permit, thereby eliminating many significant biological or ecological effects. Operational discharges are not expected to cause significant adverse impacts to EFH.

Accidents: An accidental oil spill has the potential to cause some detrimental effects on EFH. Oil spills that contact coastal bays and estuaries, as well as OCS waters when pelagic eggs and larvae are present, have the greatest potential to affect fisheries. However, it is unlikely that an oil spill would occur from the proposed activities (refer to **Item 5**, Water Quality). The activities proposed in this plan will be covered by Apache Corporation's Regional OSRP (refer to information submitted in **Appendix H**).

There are no other IPFs (including emissions, or wastes sent to shore for treatment or disposal) from the proposed activities which could impact essential fish habitat.

2. Marine and Pelagic Birds

IPFs that could impact marine birds as a result of the proposed activities include air emissions, accidental oil spills, and discarded trash and debris from vessels and the facilities.

Emissions: Emissions of pollutants into the atmosphere from these activities are far below concentrations which could harm coastal and marine birds.

Accidents: An oil spill would cause localized, low-level petroleum hydrocarbon contamination. However, it is unlikely that an oil spill would occur from the proposed activities (refer to **Item 5**, Water Quality). Marine and pelagic birds feeding at the spill location may experience chronic, nonfatal, physiological stress. It is expected that few, if any, coastal and marine birds would actually be affected to that extent. The activities proposed in this plan will be covered by Apache Corporation's Regional OSRP (refer to information submitted in **Appendix H**).

Discarded trash and debris: Marine and pelagic birds could become entangled and snared in discarded trash and debris, or ingest small plastic debris, which can cause permanent injuries and death. Operators are prohibited from deliberately discharging debris as mandated by MARPOL-Annex V and the Marine Plastic Pollution Research and Control Act, and regulations imposed by various agencies including the United States Coast Guard (USCG) and the Environmental Protection Agency (EPA). Apache Corporation will operate in accordance with the regulations and also avoid accidental loss of solid waste items by maintaining waste management plans, manifesting trash sent to shore, and using special precautions such as covering outside trash bins to prevent accidental loss of solid waste. Special caution will be exercised when handling and disposing of small items and packaging materials, particularly those made of non-biodegradable, environmentally persistent materials such as plastic or glass. Informational placards will be posted on all vessels and facilities having sleeping or food preparation capabilities. All offshore personnel, including contractors and other support services-related personnel (e.g. helicopter pilots, vessel captains and boat crews) will be indoctrinated on waste procedures, and will view the video (or Microsoft PowerPoint presentation), "Think About It" (previously "All Washed Up: The Beach Litter Problem"). Thereafter, all personnel will view the marine trash and debris training video annually. Offshore personnel will also receive an explanation from Apache Corporation management or the designated lease operator management that emphasizes their commitment to waste management in accordance with NTL No. 2012-G01. Debris, if any, from these proposed activities will seldom interact with marine and pelagic birds; therefore, the effects will be negligible.

There are no other IPFs (including effluents, physical disturbances to the seafloor, or wastes sent to shore for treatment or disposal) from the proposed activities which could impact marine and pelagic birds.

3. Public Health and Safety Due to Accidents.

There are no IPFs (emissions, effluents, physical disturbances to the seafloor, wastes sent to shore for treatment or disposal or accidents, including an accidental H₂S releases) from the proposed activities which could cause impacts to public health and safety. In accordance with NTL No.'s 2008-G04, 2009-G27, and 2009-G31, sufficient information is included in **Appendix D** to justify our request that our proposed activities be classified by BSEE as H₂S absent.

Coastal and Onshore

1. Beaches

IPFs from the proposed activities that could cause impacts to beaches include accidents (oil spills) and discarded trash and debris.

Accidents: Oil spills contacting beaches would have impacts on the use of recreational beaches and associated resources. Due to the response capabilities that would be implemented, no significant adverse impacts are expected. The activities proposed in this plan will be covered by Apache Corporation's Regional OSRP (refer to information submitted in **Appendix H**).

Discarded trash and debris: Trash on the beach is recognized as a major threat to the enjoyment and use of beaches. There will only be a limited amount of marine debris, if any, resulting from the proposed activities. Operators are prohibited from deliberately discharging debris as mandated by MARPOL-Annex V and the Marine Plastic Pollution Research and Control Act, and regulations imposed by various agencies including the United States Coast Guard (USCG) and the Environmental Protection Agency (EPA). Apache Corporation will operate in accordance with the regulations and also avoid accidental loss of solid waste items by maintaining waste management plans, manifesting trash sent to shore, and using special precautions such as covering outside trash bins to prevent accidental loss of solid waste. Special caution will be exercised when handling and disposing of small items and packaging materials, particularly those made of non-biodegradable, environmentally persistent materials such as plastic or glass.

Informational placards will be posted on all vessels and facilities having sleeping or food preparation capabilities. All offshore personnel, including contractors and other support services-related personnel (e.g. helicopter pilots, vessel captains and boat crews) will be indoctrinated on waste procedures, and will view the video (or Microsoft PowerPoint presentation), "Think About It" (*previously "All Washed Up: The Beach Litter Problem"*). Thereafter, all personnel will view the marine trash and debris training video annually. Offshore personnel will also receive an explanation from Apache Corporation management or the designated lease operator management that emphasizes their commitment to waste management in accordance with NTL No. 2012-G01.

There are no other IPFs (emissions, effluents, physical disturbances to the seafloor, or wastes sent to shore for treatment or disposal) from the proposed activities which could impact beaches.

2. Wetlands

Salt marshes and seagrass beds fringe the coastal areas of the Gulf of Mexico. Due to the distance from shore (21.47 miles), accidents (oil spills) and discarded trash and debris represent IPFs which could impact these resources.

Accidents: Level of impact from an oil spill will depend on oil concentrations contacting vegetation, kind of oil spilled, types of vegetation affected, season of the year, pre-existing stress level of the vegetation, soil types, and numerous other factors. Light-oiling impacts will cause plant die-back with recovery within two growing seasons without artificial replanting. However, it is unlikely that an oil spill would occur from the proposed activities (refer to **Item 5**, Water quality). If a spill were to occur, response capabilities as outlined in Apache Corporation's Regional OSRP (refer to information submitted in **Appendix H**) would be implemented.

Discarded trash and debris: There will only be a limited amount of marine debris, if any, resulting from the proposed activities. Operators are prohibited from deliberately discharging debris as mandated by MARPOL-Annex V and the Marine Plastic Pollution Research and Control Act, and regulations imposed by various agencies including the United States Coast Guard (USCG) and the Environmental Protection Agency (EPA). Apache Corporation will operate in accordance with the regulations and also avoid accidental loss of solid waste items by maintaining waste management plans, manifesting trash sent to shore, and using special precautions such as covering outside trash bins to prevent accidental loss of solid waste. Special caution will be exercised when handling and disposing of small items and packaging materials, particularly those made of non-biodegradable, environmentally persistent materials such as plastic or glass.

Informational placards will be posted on all vessels and facilities having sleeping or food preparation capabilities. All offshore personnel, including contractors and other support services-related personnel (e.g. helicopter pilots, vessel captains and boat crews) will be indoctrinated on waste procedures, and will view the video (or Microsoft PowerPoint presentation), "Think About It" (*previously "All Washed Up: The Beach Litter Problem"*). Thereafter, all personnel will view the marine trash and debris training video annually. Offshore personnel will also receive an explanation from Apache Corporation management or the designated lease operator management that emphasizes their commitment to waste management in accordance with NTL No. 2012-G01.

There are no other IPFs (emissions, effluents, physical disturbances to the seafloor, or wastes sent to shore for treatment or disposal) from the proposed activities that could cause impacts to wetlands.

3. Shore Birds and Coastal Nesting Birds

WMA Pass A Loutre (22.4 miles from Main Pass Block 295) is a highly productive habitat for wildlife. Thousands of shore birds use the refuge as a wintering area. Also, wading birds nest on the refuge. The WMA provides habitat for colonies of nesting wading birds and seabirds as well as wintering shorebirds and waterfowl. The most abundant nesters are brown pelicans, laughing gulls, and royal, Caspian, and sandwich terns. IPFs from the proposed activities that could cause impacts to shore birds and coastal nesting birds are accidents (oil spills) and discarded trash and debris.

Accidents: Oil spills could cause impacts to shore birds and coastal nesting birds. The birds most vulnerable to direct effects of oiling include those species that spend most of their time swimming on and under the sea surface, and often aggregate in dense flocks (Piatt et al., 1990; Vauk et al., 1989). Coastal birds, including shorebirds, waders, marsh birds, and certain water fowl, may be the hardest hit indirectly through destruction of their feeding habitat and/or food source (Hansen, 1981; Vermeer and Vermeer, 1975). Direct oiling of coastal birds and certain seabirds is usually minor; many of these birds are merely stained as a result of their foraging behaviors. Birds can ingest oil when feeding on contaminated food items or drinking contaminated water.

Oil-spill cleanup operations will result in additional disturbance of coastal birds after a spill. However, it is unlikely that an oil spill would occur from the proposed activities (refer to **Item 5**, Water quality). Due to the distance from shore being 21.47 miles, Apache Corporation would immediately implement the response capabilities outlined in their Regional OSRP (refer to information submitted in **Appendix H**).

Discarded trash and debris: Shore birds and coastal nesting birds are highly susceptible to entanglement in floating, submerged, and beached marine debris: specifically plastics. Operators are prohibited from deliberately discharging debris as mandated by MARPOL-Annex V and the Marine Plastic Pollution Research and Control Act, and regulations imposed by various agencies including the United States Coast Guard (USCG) and the Environmental Protection Agency (EPA). Apache Corporation will operate in accordance with the regulations and also avoid accidental loss of solid waste items by maintaining waste management plans, manifesting trash sent to shore, and using special precautions such as covering outside trash bins to prevent accidental loss of solid waste. Special caution will be exercised when handling and disposing of small items and packaging materials, particularly those made of non-biodegradable, environmentally persistent materials such as plastic or glass.

Informational placards will be posted on vessels and every facility that has sleeping or food preparation capabilities. All offshore personnel, including contractors and other support services-related personnel (e.g. helicopter pilots, vessel captains and boat crews) will be indoctrinated on waste procedures, and will view the video (or Microsoft PowerPoint presentation), "Think About It" (previously "All Washed Up: The Beach Litter Problem"). Thereafter, all personnel will view the marine trash and debris training video annually. Offshore personnel will also receive an explanation from Apache Corporation management or the designated lease operator management that emphasizes their commitment to waste management in accordance with NTL No. 2012-G01.

There are no other IPFs (emissions, effluents, physical disturbances to the seafloor, or wastes sent to shore for treatment or disposal) from the proposed activities that could cause impacts to shore birds and coastal nesting birds.

4. Coastal Wildlife Refuges

Main Pass Block 295 is 22.4 miles from the WMA Pass A Loutre. Management goals of the WMA are waterfowl habitat management, marsh restoration, providing sanctuary for nesting and wintering seabirds, and providing sandy beach habitat for a variety of wildlife species. IPFs from the proposed activities that could cause impacts to this coastal wildlife refuge are accidents (oil spills) and discarded trash and debris.

Impacts to shore birds and coastal nesting birds and to the beach, was covered in previous sections. Other wildlife species found on the refuges include nutria, rabbits, raccoons, alligators, and loggerhead turtles. Impacts to loggerhead turtles were also covered under a previous section.

Accidents: It is unlikely that an oil spill would occur from the proposed activities (refer to **Item 5, Water quality**). Response capabilities would be implemented, no impacts are expected. The activities proposed in this plan will be covered by Apache Corporation's Regional OSRP (refer to information submitted in **Appendix H**).

Discarded trash and debris: Operators are prohibited from deliberately discharging debris as mandated by MARPOL-Annex V, the Marine Plastic Pollution Research and Control Act and regulations imposed by various agencies including the United States Coast Guard (USCG) and the Environmental Protection Agency (EPA). Apache Corporation will operate in accordance with the regulations and also avoid accidental loss of solid waste items by maintaining waste management plans, manifesting trash sent to shore, and using special precautions such as covering outside trash bins to prevent accidental loss of solid waste. Special caution will be exercised when handling and disposing of small items and packaging materials, particularly those made of non-biodegradable, environmentally persistent materials such as plastic or glass.

Informational placards will be posted on vessels and every facility that has sleeping or food preparation capabilities. All offshore personnel, including contractors and other support services-related personnel (e.g. helicopter pilots, vessel captains and boat crews) will be indoctrinated on waste procedures, and will view the video (or Microsoft PowerPoint presentation), "Think About It" (*previously "All Washed Up: The Beach Litter Problem"*). Thereafter, all personnel will view the marine trash and debris training video annually. Offshore personnel will also receive an explanation from Apache Corporation management or the designated lease operator management that emphasizes their commitment to waste management in accordance with NTL No. 2012-G01.

There are no other IPFs (emissions, effluents, physical disturbances to the seafloor, or wastes sent to shore for treatment or disposal) from the proposed activities that could cause impacts to coastal wildlife refuges.

There are no other IPFs (emissions, effluents, physical disturbances to the seafloor, or wastes sent to shore for treatment or disposal) from the proposed activities that could cause impacts to coastal wildlife refuges.

5. Wilderness Areas

Accidents: An accidental oil spill from the proposed activities could cause impacts to wilderness areas. However, it is unlikely that an oil spill would occur from the proposed activities (refer to **Item 5, Water Quality**). Due to the distance from the nearest designated Wilderness Area (35.5 miles) and the response capabilities that would be implemented, no significant adverse impacts are expected. The activities proposed in this plan will be covered by Apache Corporation's Regional OSRP (refer to information submitted in **Appendix H**).

Discarded trash and debris: Operators are prohibited from deliberately discharging debris as mandated by MARPOL-Annex V, the Marine Plastic Pollution Research and Control Act and regulations imposed by various agencies including the United States Coast Guard (USCG) and the Environmental Protection Agency (EPA). Apache Corporation will operate in accordance with the regulations and also avoid accidental loss of solid waste items by maintaining waste management plans, manifesting trash sent to shore, and using special precautions such as covering outside trash bins to prevent accidental loss of solid waste. Special caution will be exercised when handling and disposing of small items and packaging materials, particularly those made of non-biodegradable, environmentally persistent materials such as plastic or glass.

Informational placards will be posted on vessels and every facility that has sleeping or food preparation capabilities. All offshore personnel, including contractors and other support services-related personnel (e.g. helicopter pilots, vessel captains and boat crews) will be indoctrinated on waste procedures, and will view the video (or Microsoft PowerPoint presentation), "Think About It" (*previously "All Washed Up: The Beach Litter Problem"*). Thereafter, all personnel will view the marine trash and debris training video annually. Offshore personnel will also receive an explanation from Apache Corporation management or the designated lease operator management that emphasizes their commitment to waste management in accordance with NTL No. 2012-G01.

There are no other IPFs (emissions, effluents, physical disturbances to the seafloor, or wastes sent to shore for treatment or disposal) from the proposed activities that could cause impacts to wilderness areas.

6. Other Environmental Resources Identified

There are no other environmental resources identified for this impact assessment.

(C) IMPACTS ON PROPOSED ACTIVITIES

The site-specific environmental conditions have been taken into account for the proposed activities. No impacts are expected on the proposed activities from site-specific environmental conditions.

(D) ENVIRONMENTAL HAZARDS

During the hurricane season, June through November, the Gulf of Mexico is impacted by an average of ten tropical storms (39-73 mph winds), of which six become hurricanes (> 74 mph winds). Due to its location in the gulf, Main Pass Block 295 may experience hurricane and tropical storm force winds, and related sea currents. These factors can adversely impact the integrity of the operations covered by this plan. A significant storm may present physical hazards to operators and vessels, damage exploration or production equipment, or result in the release of hazardous materials (including hydrocarbons). Additionally, the displacement of equipment may disrupt the local benthic habitat and pose a threat to local species.

The following preventative measures included in this plan may be implemented to mitigate these impacts:

1. Drilling & completion
 - a. Secure well
 - b. Secure rig / platform
 - c. Evacuate personnel

Drilling activities will be conducted in accordance with NTL No.'s 2008-G09, 2009-G10, and 2010-N10 .

2. Structure Installation
Operator will not conduct structure installation operations during Tropical Storm or Hurricane threat.

(E) ALTERNATIVES

No alternatives to the proposed activities were considered to reduce environmental impacts.

(F) MITIGATION MEASURES

No mitigation measures other than those required by regulation will be employed to avoid, diminish, or eliminate potential impacts on environmental resources.

(G) CONSULTATION

No agencies or persons were consulted regarding potential impacts associated with the proposed activities. Therefore, a list of such entities has not been provided.

(H) PREPARER(S)

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Although not cited, the following were utilized in preparing this EIA:

- Hazard Surveys
- BOEM EIS's:
 - GOM Deepwater Operations and Activities. Environmental Assessment. MMS 2000-001
 - GOM Central and Western Planning Areas Sales 166 and 168 Final Environmental Impact Statement. MMS 96-0058.

SECTION P
ADMINISTRATIVE INFORMATION
(30 CFR Parts 250.228 and 250.262)

A. EXEMPTED INFORMATION DESCRIPTION

Included in the proprietary copy and removed from the public copy of this Exploration Plan are the proposed bottom-hole locations of the planned well(s), discussions of the target objectives, geologic and/or geophysical data, and any interpreted geology.

B. BIBLIOGRAPHY

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