UNITED STATES GOVERNMENT
MEMORANDUM

April 26, 2005

To: Public Information (MS 5034)

From: Plan Coordinator, FO, Plans Section (MS 5231)

Subject: Public Information copy of plan

Control #	-	N-08399
Type	-	Initial Exploration Plan
Lease(s)	-	OCS-G16894 Block - 272 Atwater Valley Area
Operator	-	BP Exploration & Production Inc.
Description	-	Wells A, B, and C
Rig Type	-	DP SEMISUBMERSIBLE

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	G16894/AT/272	6912 FSL, 2859 FWL	G16894/AT/272
WELL/B	G16894/AT/272	6852 FSL, 6048 FWL	G16894/AT/272
WELL/C	G16894/AT/272	6852 FSL, 6048 FWL	G16894/AT/272

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NOTED - SCHEXNAILDRE

N-8399

bp

Scherie Douglas
North America Exploration
501 WestLake Park Boulevard
Houston, Texas 77079

Telephone: (281) 366-6843
Fax: (281) 366-7556
Scherie.Douglas@bp.com

April 20, 2005

Regional Supervisor
Office of Field Operations
U.S. Department of the Interior
Minerals Management Service
1201 Elmwood Park Boulevard
New Orleans, LA 70123-2394

Attn: Nick Wetzel

Re: Initial Exploration Plan for Lease OCS-G 16894, Atwater Valley Block 272

Gentlemen:

In accordance with the provisions of Title 30 CFR 250.204 and that certain Notice to Lessees (NTL 2003-G17), BP Exploration & Production Inc. (BP) hereby submits for your review and approval nine (9) copies of an Exploration Plan for Leases OCS-G 16894, Atwater Valley Block 272, Offshore, Louisiana. Five (5) copies are "Proprietary Information" and four (4) copies are "Public Information".

Three copies of the Regional 3D Geohazard Assessment Study over Atwater Valley Blocks 227-229, 271-273 and 315-317 prepared by Gardline Surveys Inc. are included with this plan.

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

BP anticipates activities will commence under this proposed Exploration Plan on approximately July 1, 2005.

Should you have questions or require further information, please contact me at (281) 366-6843.

Sincerely,

Scherie Douglas

Scherie Douglas
Regulatory Specialist

Attachments

CONTROL No. N-8399
REVIEWER: Michelle Griffitt
PHONE: (504) 736-2975

BP EXPLORATION & PRODUCTION, INC.

INITIAL EXPLORATION PLAN

ATWATER VALLEY BLOCK 272
OCS-G 16894

Public Information

April 2005

SECTION 1.0

CONTENTS OF PLAN

1.1 Description of Proposed Activities

In this Exploration Plan (EP) BP Exploration and Production, Inc. proposes to drill and temporarily abandon three (3) exploratory wells in Atwater Valley Block 272. Information pertaining to the geological targets, including a narrative of trapping features, is addressed in Section 3 "Geological and Geophysical Information" of this plan. No well testing is proposed.

1.2 Tentative Schedule

Drilling operations as proposed by this plan are scheduled to begin on or about July 1, 2005, subject to approval of this plan and subsequent Applications for a Permit to Drill. BP proposes to conduct the proposed operations as outlined in the activity schedule included in the attached OCS Plan Information Form.

1.3 Location Information

Included as attachments to Section 1 are Form MMS-137 "OCS Plan Information Form", and a well location plat prepared in accordance with that certain Notice to Lessees NTL 2002-G08.

1.4 Drilling Unit

Proposed well locations will be drilled with Diamond's dynamically positioning rig *Ocean Confidence*.

Please note that if the aforementioned semi-submersible drilling rigs are not available and another rig is contracted, any differences regarding air emissions, drilling equipment, pollution control and safety equipment will be addressed at that time.

Safety features on the MODU 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 MMS Notices to Lessees and current policy making invoked by the MMS. The *Ocean Confidence* is ISO 14001 certified.

The MMS 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 MMS 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, rig 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 GMG290000.

1.5 Attachments to Section 1.0

- OCS Plan Information Form
- Well Location Maps

OCS PLAN INFORMATION FORM

General Information

Type of OCS Plan	X	Exploration Plan (EP)		Development Operations Coordination Document (DOCD)	
Company Name: BP Exploration & Production, Inc.			MMS Operation Number: 02481		
Address: 501 Westlake Park Blvd			Contact Person: Scherie Douglas		
Houston, TX 77079			Phone Number: 281-366-6843		
			E-Mail Address: scherie.douglas@bp.com		
Lease(s):OCS-G 16894	Area: AT	Block(s): 272	Project Name (If Applicable): Everest		
Objective(s): X Oil	Gas	Sulphur	Salt	Onshore Base: Fourchon, LA	Distance to Closes Land (Miles): 86

Description of Proposed Activities (Mark all that apply)

X	Exploration drilling		Development drilling
	Well completion		Installation of production platform
	Well test flaring (for more than 48 hours)		Installation of production facilities
	Installation of caisson or platform as well protection structure		Installation of satellite structure
	Installation of subsea wellheads and/or manifolds		Commence production
	Installation of lease term pipelines		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 MMS-designated high-probability archaeological area?		Yes	X	No
Have all of the surface locations of your proposed activities been previously reviewed and approved by MMS?		Yes	X	No

Tentative Schedule of Proposed Activities

Proposed Activity	Start Date	End Date	No. of Days
Drill and temporarily abandon well location "A"	07/01/05	11/02/05	125
Drill and temporarily abandon well location "B"	05/15/06	09/17/06	125
Drill and temporarily abandon well location "C"	05/15/07	09/17/07	125

Description of Drilling Rig

	Jackup		Drillship		Caisson		Tension Leg Platform
	Gorilla Jackup		Platform rig		Well protector		Compliant tower
	Semi-submersible		Submersible		Fixed Platform		Guyed tower
X	DP Semi-submersible		Other (Attach description)		Subsea manifold		Floating production system
Drilling Rig Name (if known): Deepwater Horizon					Spar		Other (Attach Description)

Description of Production Platform

Description of Lease Term Pipelines

From (Facility/Area/Block)	To (Facility/Area/Block)	Diameter (Feet)	Length (Feet)
NA			

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): Well Location "A"	**Subsea Completion**			
Anchor Radius (if applicable) in feet:		Yes	X	No

	Surface Location	Bottom-Hole Location (For Wells)
Lease No.	OCS-G 16894	
Area Name	AT	
Block No.	272	
Blockline Departures (in feet)	N/S Departure 6912' F_S_L	
	E/W Departure 2859' F_W_L	
Lamber X-Y coordinates	X: 810,699.00	
	Y: 10,049,472.00	
Latitude / Longitude	Latitude 27° 40' 11.327" N	
	Longitude 89° 33' 49.748" W	
	TVD (Feet): 23,088	MD (Feet): 24,322	Water Depth (Feet): 4318

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
1 NA			X=	Y=	
2			X=	Y=	
3			X=	Y=	
4			X=	Y=	
5			X=	Y=	
6			X=	Y=	
7			X=	Y=	
8			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 MMS collects this information as part of an applicant's Exploration Plan or Development Operations Coordination Document submitted for MMS 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.

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): Well Location "B"	*Subsea Completion*
Anchor Radius (if applicable) in feet:	Yes:	X	No

	Surface Location	Bottom-Hole Location (For Wells)
Lease No.	OCS-G 16894	
Area Name	AT	
Block No.	272	
Blockline Departures (in feet)	N/S Departure 6852' F_S_L	
	E/W Departure 6048' F_W_L	
Lamber X-Y coordinates	X: 813,888.00	
	Y: 10,049,412.00	
Latitude / Longitude	Latitude 27° 40' 11.388" N	
	Longitude 89° 33' 14.288" W	
	TVD (Feet): 23,633	MD (Feet): 23,633.10	Water Depth (Feet): 4282

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
1 NA			X=	Y=	
2			X=	Y=	
3			X=	Y=	
4			X=	Y=	
5			X=	Y=	
6			X=	Y=	
7			X=	Y=	
8			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 MMS collects this information as part of an applicant's Exploration Plan or Development Operations Coordination Document submitted for MMS 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.

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): Well Location "C"	*Subsea Completion*			
Anchor Radius (if applicable) in feet:		Yes	X	No

	Surface Location	Bottom-Hole Location (For Wells)
Lease No.	OCS-G 16894	
Area Name	AT	
Block No.	272	
Blockline Departures	N/S Departure 6852' F_S_L	
(in feet)	E/W Departure 6048' F_W_L	
Lamber X-Y coordinates	X: 813,888.00	
	Y: 10,049,412.00	
Latitude / Longitude	Latitude 27° 40' 11.388" N	
	Longitude 89° 33' 14.288" W	
	TVD (Feet): 23,000	MD (Feet): 24,000 / Water Depth (Feet): 4282

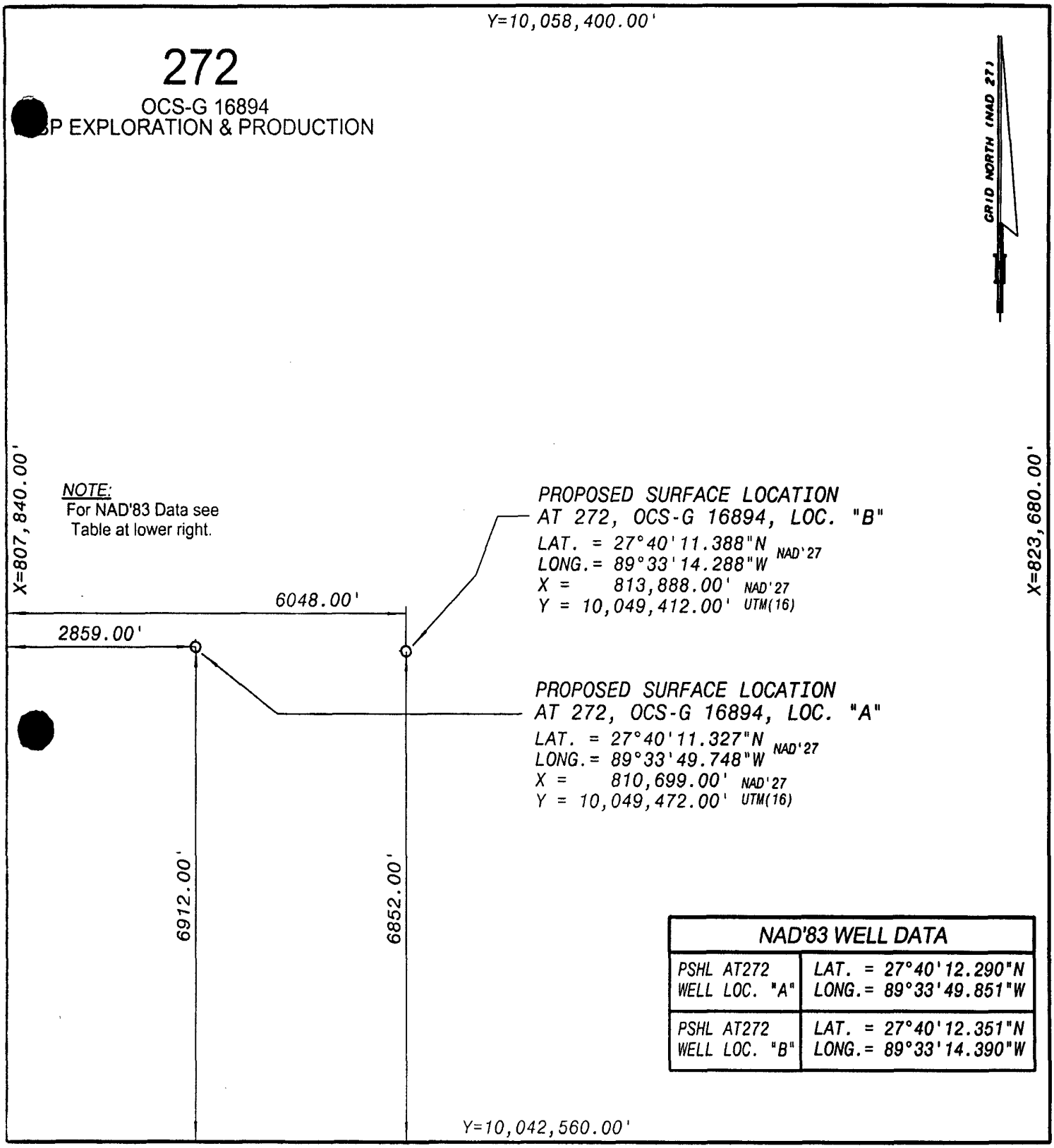
Anchor Locations for Drilling Rig or Construction Barge (If anchor radius supplied above, not necessary)

Anchor Name or No.	Area	Block	X Coordinate	Y Coordinate	Length of Anchor Chain on Seafloor
1 NA			X=	Y=	
2			X=	Y=	
3			X=	Y=	
4			X=	Y=	
5			X=	Y=	
6			X=	Y=	
7			X=	Y=	
8			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 MMS collects this information as part of an applicant's Exploration Plan or Development Operations Coordination Document submitted for MMS 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.

272

OCS-G 16894
BP EXPLORATION & PRODUCTION



NAD'83 WELL DATA	
PSHL AT272 WELL LOC. "A"	LAT. = 27°40'12.290"N LONG.= 89°33'49.851"W
PSHL AT272 WELL LOC. "B"	LAT. = 27°40'12.351"N LONG.= 89°33'14.390"W

NOTES:
1) All data: North American Datum of 1927 (NAD'27) (Except where noted)
2) All geodetic conversions transformed using NADCON version 2.0 or better, equivalent software

"PUBLIC INFORMATION"

bp

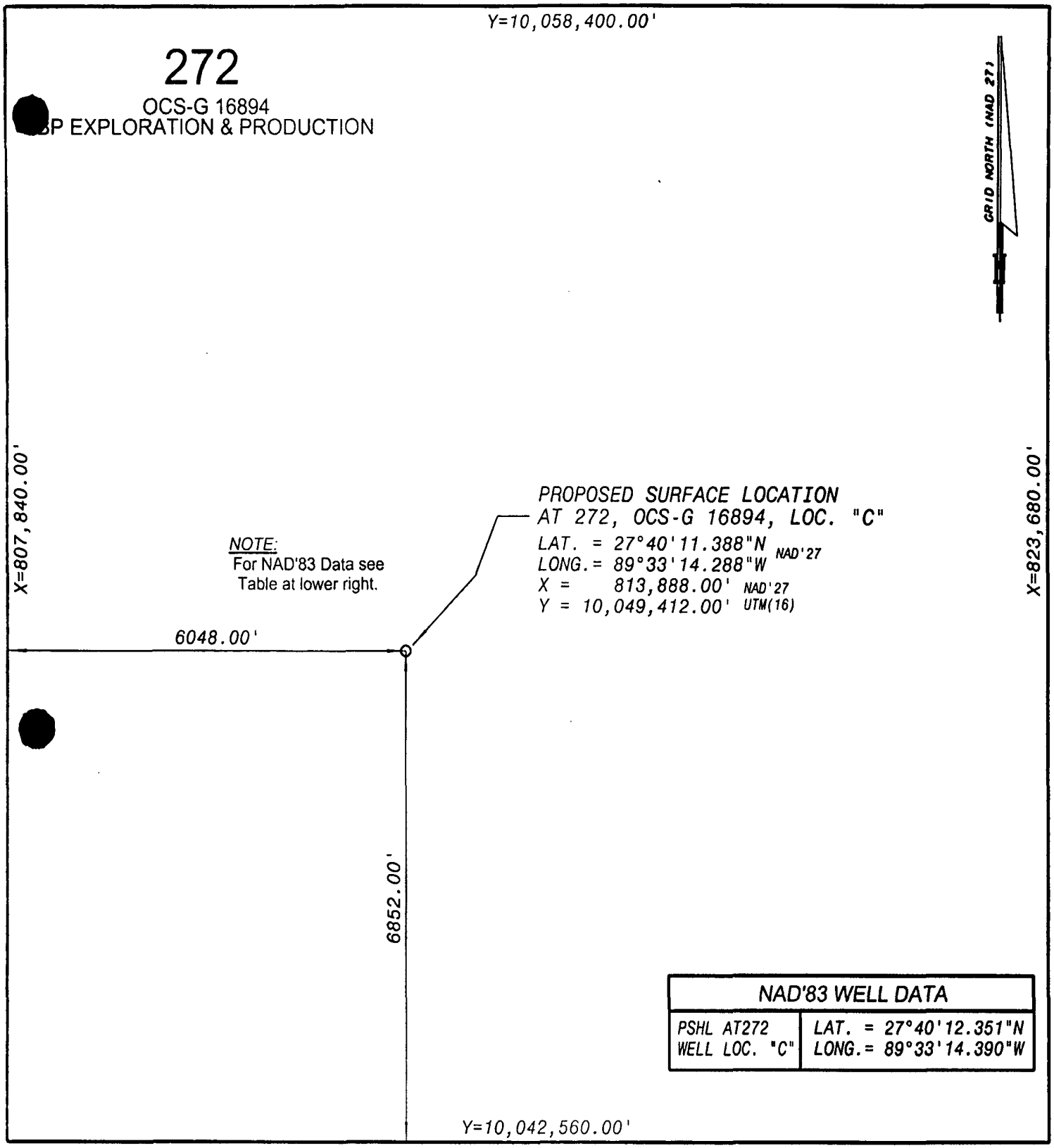
BP EXPLORATION AND PRODUCTION

PROPOSED AT 272, OCS-G 16894, LOCATION "A" & "B"

Atwater Valley (OPD# NG16-01) Block 272 Offshore Federal

Plat prepared by BP America Inc. - GPM&S - Land Survey Engineering

Scale:1"= 2000'
Date: 04/18/05
Drw.by RWB
OG-AT101.dgn



NAD'83 WELL DATA	
PSHL AT272 WELL LOC. "C"	LAT. = 27°40'12.351"N LONG.= 89°33'14.390"W

NOTES:
1) All data: North American Datum of 1927 (NAD'27) (Except where noted)
2) All geodetic conversions transformed using NADCON version 2.0 or better, equivalent software

"PUBLIC INFORMATION"

bp	BP EXPLORATION AND PRODUCTION PROPOSED AT 272, OCS-G 16894, LOCATION "C" Atwater Valley (OPD# NG16-01) Block 272 Offshore Federal Plat prepared by BP America Inc. · GPM&S · Land Survey Engineering	Scale:1"= 2000' Date: 04/18/05 Drw.by RWB OG-AT101.dgn

SECTION 2.0

GENERAL INFORMATION

2.1 Contact Information

The authorized representative of BP Exploration & Production Inc. to whom questions regarding this plan should be addressed is:

Scherie Douglas	Office:	(281) 366-6843
BP Exploration & Production, Inc.	Cell:	(713) 702-7673
501 Westlake Park Boulevard	Fax:	(281) 366-3599
Houston Texas 77079	Email:	Scherie.Douglas@bp.com

2.2 New or Unusual Technology

BP Exploration & Production Inc. does not propose utilizing any new or unusual technology during the proposed drilling operations.

2.3 Bonding Information

BP Exploration & Production Inc. is covered by a $3,000,000 area-wide general lease surety bond in accordance with requirements of 30 CFR 256, Subpart I and Notice to Lessees NTL No. 2000-G16 dated September 7, 2000, concerning bond coverage requirements for Outer Continental Shelf (OCS) oil and gas leases and post lease operations.

2.4 Onshore Base and Support Vessels

The onshore support base for the proposed operations will be in Fourchon, Louisiana. Atwater Valley Block 272 is located approximately 86 miles from the nearest Louisiana shoreline and approximately 107 miles from a proposed onshore support base located in Fourchon, Louisiana.

The C-Port Fourchon, Louisiana facility provides a vehicle parking lot, office space, radio communication equipment, outside and warehouse storage space, crane, forklifts, water and fueling facilities, and boat dock space. The base is owned by Chouest and is leased by BP Exploration & Production Inc. The base is in operation 24 hours each day.

A small amount of vessel and helicopter traffic may originate from bases other those described above in order to address changes in weather, market, and operational conditions. It is expected that this vessel traffic will originate from bases and locations that are in the near vicinity of the base previously described.

The proposed operations are temporary in nature and do not mandate any immediate measures for additional land acquisition or expansion of the existing onshore base facilities.

2.5 Support Vessels

Personnel involved in the proposed operations will typically use their own vehicles as transportation to and from the selected onshore base. The selected vendors will transport equipment by a combination of trucks, boats and/or helicopters to the onshore

base. The personnel and equipment will then be transported to the drilling rig, taking the most direct route feasible as mandated by weather and traffic conditions. Two types of helicopters and various vessel types will be used during the proposed deepwater exploratory drilling operations. Boats are required when weather conditions restrict helicopter operations, for delivery of supplies and equipment, and for routine personnel change-outs.

Support vessels and travel frequency during the proposed drilling activities are as follows:

Support Vessel	Drilling Trips Per Week
Crew Boat	2
Supply Boat	4
Helicopter	6

A vicinity map showing the surface locations in Atwater Valley Block 272 relative to the shoreline and onshore base is included as an attachment to this section of the plan.

2.6 Lease Stipulations

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 MMS is responsible for ensuring full compliance with stipulations.

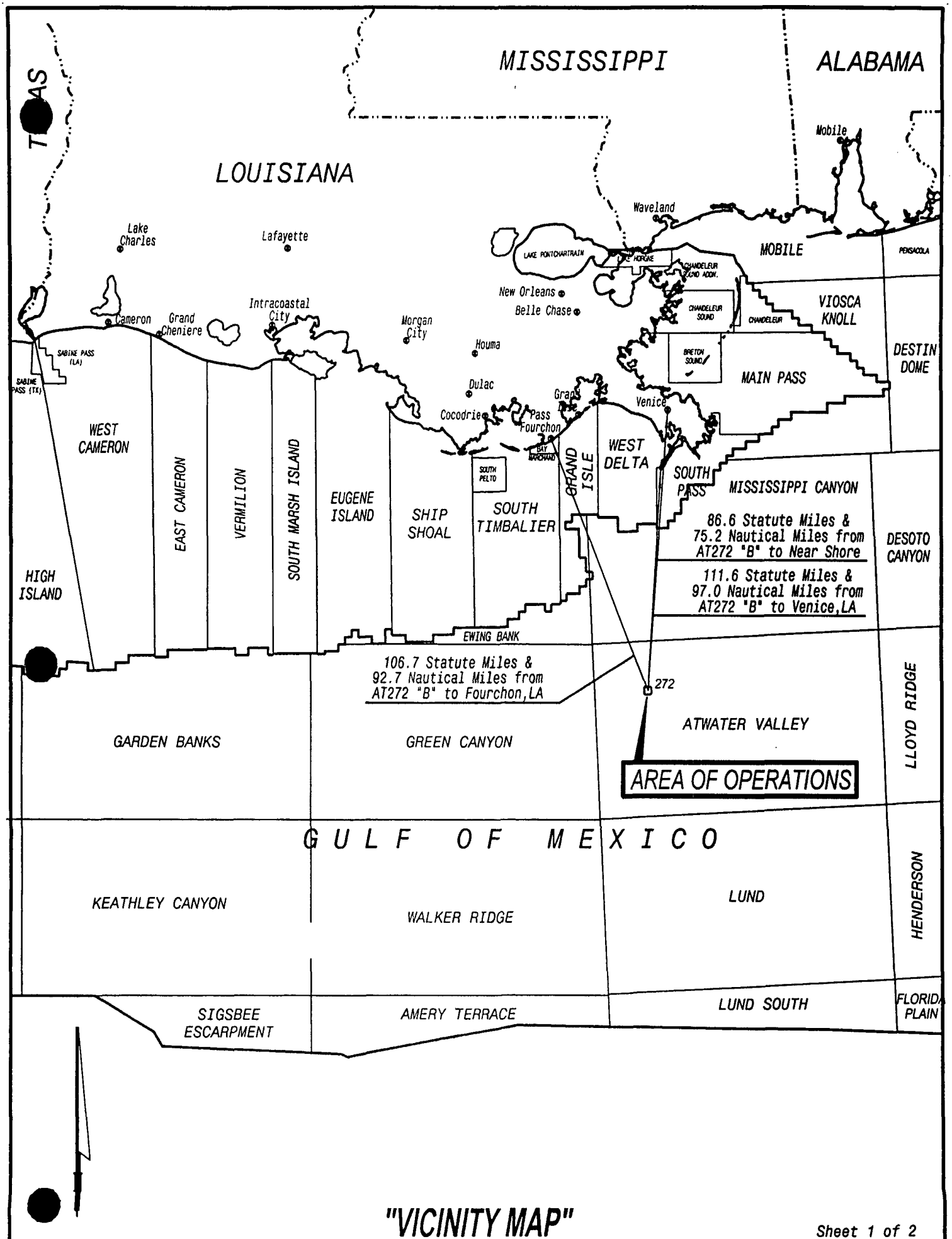
The Minerals Management Service has not imposed any lease stipulations on OCS-G 16894, Atwater Valley Block 272.

2.7 Project Name

The BP Exploration & Production Inc. deepwater project in Atwater Valley Block 272 area has been given the project name "Everest".

2.8 Attachments

- Vicinity Map



"VICINITY MAP"

Sheet 1 of 2

bp	BP EXPLORATION AND PRODUCTION PROPOSED AT 272, OCS-G 16894, LOCATION "A" & "B" Atwater Valley (OPD# NG16-01) Block 272 Offshore Federal Plat prepared by BP America Inc. - GPM&S - Land Survey Engineering	Date: 04/18/05 Drw.by RWB OG-AT101.dgn

SECTION 3.0

GEOLOGICAL, GEOPHYSICAL, AND H_2S INFORMATION

3.1 Geological and Geophysical Information

The following subsections describe the various geological and geophysical data that has been included with this plan. Maps and cross-sections can be found at the end of this descriptive section or as attachments to the overall plan.

3.1.1 Structure contour maps - Current structure contour maps at a scale of 1 inch = 2,000 feet (depth-based, expressed in feet subsea) drawn on the top of each prospective hydrocarbon sand, showing the entire lease block and the location of each proposed well and the locations of geological cross-sections.

3.1.2 Interpreted two-dimensional (2-D) and/or three-dimensional (3-D) seismic lines - Page-size copies of migrated and annotated (shot points, time lines, well paths) 2-D and/or 3-D seismic lines within 500 feet of the surface locations of the proposed wells

3.1.3 Geological structure cross-sections - Interpreted geological structure cross-sections showing the location and depth of each proposed well showing at least one key horizon and the objective sands.

3.1.4 Shallow hazards report - Three copies of the Regional 3D Geohazard Assessment Study over Atwater Valley Blocks 227-229, 271-273, and 315-317 prepared by Gardline Surveys Inc. are included with this plan.

3.1.5 Shallow hazards assessment –A shallow hazards analysis prepared, in accordance with NTL No. 98-20, for the proposed surface locations evaluating seafloor and subsurface geologic and manmade features and conditions.

3.1.6 High resolution seismic lines – BP is requesting approval to utilize existing 3-D seismic data for shallow hazards clearance in lieu of acquiring HR 2-D site survey data. The request is being submitted to MMS by Gardline Surveys Inc. under separate cover.

3.1.7 Stratigraphic column – Generalized biostratigraphic/lithostratigraphic column from the seafloor to the total depth of the proposed wells.

3.1.8 Time vs. depth tables – The prospect is mapped on depth data that have been calibrated to the nearby well control; therefore, tables providing seismic time versus depth for the proposed well locations are not required.

3.1.9 Geological objectives – Attached

3.2 H_2S Information

Pursuant to 30 CFR 250.67, BP Exploration & Production, Inc. hereby requests a determination that Atwater Valley Block 272 is located in an area where the absence of H_2S has been confirmed.

3.3 Attachments to Section 3.0

- Structure contour map *(Proprietary information)*
- Interpreted seismic lines *(Proprietary information)*
- Geological structure cross sections *(Proprietary information)*
- Shallow hazards report *(three copies only)*
- Shallow hazards assessment and associated maps
- Stratigraphic column *(Proprietary information)*
- Geological Objective *(Proprietary information)*

SITE CLEARANCE LETTER – AT272-A

18-Apr-2005
BP America, Inc.
501 Westlake Park Blvd
Room 15.186
Houston, TX 77079

Attention: Mr. Richard Weiland

Site Clearance Letter
Proposed AT272-A Location
Block 272, Atwater Valley Area
OCS-G 16894

To Whom It May Concern:
Gardline Surveys Inc. was contracted by BP America, Inc. to prepare a Site Clearance Letter for the proposed AT272-A location in Block 272, Atwater Valley Protraction Area (OCS-G 16894) in the Northern Gulf of Mexico. This letter addresses seafloor and shallow geologic conditions that may impact exploratory drilling operations within 1,500ft of the proposed wellsite. The depth limit of this site clearance assessment is Top Salt (–9,724ft below sea surface, 5,455ft below seabed). We understand that BP America, Inc. plans to drill the proposed exploration well from a dynamically positioned drill ship; therefore an anchoring assessment is not required. Letter-size *Water Depth*, *Seabed Morphology*, *Seabed Amplitude* and *Geohazards Summary Map* are presented with this site clearance letter at a scale of 1"=1,000ft, as well as annotated data examples of intersecting 3D survey lines over the proposed surface location. This site clearance assessment is based on the interpretation of 3D seismic data. This site clearance letter is issued as a supplement to Gardline Report No. 6291 entitled 3D Geohazard Assessment, Gulf of Mexico - Atwater Valley Blocks 227-229, 271-273 and 315-317, Volume 1 - Geohazard Study.

3D Geophysical Survey. BP America, Inc. provided the 3D dataset to Gardline Surveys Inc. on tape media in SEG-Y format for loading onto a Seismic Micro-Technology (SMT) workstation. The 3D data cube contains two independent surveys with 4 millisecond sample rate data to a record length of 7.0 seconds TWT below sea surface. For the survey in the east of the assessment area, inlines are oriented east-west, have a numerical increment of one, and exhibit a line spacing of approximately 65ft (20m). Crosslines are oriented north-south, have a numerical increment of one, and exhibit a line spacing of approximately 41ft (12.5m). For the survey in the west of the assessment area, inlines are oriented relatively northwest-southeast, have a numerical increment of one, and exhibit a line spacing of approximately 65ft (20m). Crosslines are oriented relatively northeast-southwest, have a numerical increment of one, and exhibit a line spacing of approximately 41ft (12.5m).

The dominant frequency of the 3D seismic dataset is estimated to be about 30Hz in the shallow section. This dominant frequency corresponds to a limit of separability (wavelength/4) of approximately 44ft, assuming an average velocity of 5,250ft/s for near seafloor sediments.

5. CONCLUSIONS AND RECOMMENDATIONS

- *Seabed:* Nearest active hydrocarbon seepage occurs ~20,200ft to the southeast, and could hold potential to harbor chemosynthetic community development.
- *Unit A – Seabed to Horizon H10:* **No Predicted Gas Hazards** within 1,500ft of the proposed location within this interval. **Negligible Shallow Water Flow Risk.**
- *Unit B – Horizon H10 to Horizon H20:* **No Predicted Gas Hazards** within 1,500ft of the proposed location within this interval. **Negligible Shallow Water Flow Risk.**
- *Unit C – Horizon H20 to Horizon H30:* **No Predicted Gas Hazards** within 1,500ft of the proposed location within this interval. Potential **Low Shallow Water Flow Risk** (*Unit C, Sub-unit C1*) from –4,833ft to –5,051ft below sea surface (564ft to 782ft below seabed) and (*Unit C, Sub-unit C3*) from –5,698ft to –6,003ft below sea surface (1,429ft to 1,734ft below seabed).
- *Unit D Uppermost – Horizon H30 to Horizon H30 plus 400ms:* **Predicted Gas Hazard** ~800ft to the northeast of the proposed location at the top of Unit D. This hazard does not affect the proposed location, and a **Negligible Gas Risk** is assigned. Potential **Low Shallow Water Flow Risk** from –6,706ft to –7,537ft below sea surface (2,437ft to 3,268ft below seabed).
- *Unit D Lowermost – Horizon H30 plus 400ms to Top Salt:* **No Predicted Gas Hazards** within 1,500ft of the proposed location within this interval. **Negligible Shallow Water Flow Risk.**

We appreciate the opportunity to work with you on this project and look forward to continuing as your geohazards consultants. Please contact us if you have any questions or if we can be of further assistance.

Sincerely,
Gardline Surveys Inc.

Andrew Haigh
Geophysical Manager

Michael Pentland
President

Copies Submitted: 6 copies to Mr. Richard Weiland, BP America, Inc.
Attachments:

- Bathymetry Extract
- Seabed Morphology Extract
- Seabed Amplitude Extract
- Geohazard Summary Extract
- 3D Seismic Profile Record, Inline 11107. Geological profile through location
- 3D Seismic Profile Record, Crossline 5774. Geological profile through location
- Top Hole Drilling Prognosis

SITE CLEARANCE LETTER – AT272-B & C

18-Apr-2005
BP America, Inc.
501 Westlake Park Blvd
Room 15.186
Houston, TX 77079

Attention: Mr. Richard Weiland

Site Clearance Letter
Proposed AT272-B & C Location
Block 272, Atwater Valley Area
OCS-G 16894

To Whom It May Concern:
Gardline Surveys Inc. was contracted by BP America, Inc. to prepare a Site Clearance Letter for the proposed AT272-B & C location in Block 272, Atwater Valley Protraction Area (OCS-G 16894) in the Northern Gulf of Mexico. This letter addresses seafloor and shallow geologic conditions that may impact exploratory drilling operations within 1,500ft of the proposed wellsite. The depth limit of this site clearance assessment is Top Salt (–9,703ft below sea surface, 5,400ft below seabed). We understand that BP America, Inc. plans to drill the proposed exploration well from a dynamically positioned drill ship; therefore an anchoring assessment is not required. Letter-size *Water Depth*, *Seabed Morphology*, *Seabed Amplitude* and *Geohazards Summary Map* are presented with this site clearance letter at a scale of 1"=1,000ft, as well as annotated data examples of intersecting 3D survey lines over the proposed surface location. This site clearance assessment is based on the interpretation of 3D seismic data. This site clearance letter is issued as a supplement to Gardline Report No. 6291 entitled 3D Geohazard Assessment, Gulf of Mexico - Atwater Valley Blocks 227-229, 271-273 and 315-317, Volume 1 - Geohazard Study.

3D Geophysical Survey. BP America, Inc. provided the 3D dataset to Gardline Surveys Inc. on tape media in SEG-Y format for loading onto a Seismic Micro-Technology (SMT) workstation. The 3D data cube contains two independent surveys with 4 millisecond sample rate data to a record length of 7.0 seconds TWT below sea surface. For the survey in the east of the assessment area, inlines are oriented east-west, have a numerical increment of one, and exhibit a line spacing of approximately 65ft (20m). Crosslines are oriented north-south, have a numerical increment of one, and exhibit a line spacing of approximately 41ft (12.5m). For the survey in the west of the assessment area, inlines are oriented relatively northwest-southeast, have a numerical increment of one, and exhibit a line spacing of approximately 65ft (20m). Crosslines are oriented relatively northeast-southwest, have a numerical increment of one, and exhibit a line spacing of approximately 41ft (12.5m).

The dominant frequency of the 3D seismic dataset is estimated to be about 30Hz in the shallow section. This dominant frequency corresponds to a limit of separability (wavelength/4) of approximately 44ft, assuming an average velocity of 5,250ft/s for near seafloor sediments.

5. CONCLUSIONS AND RECOMMENDATIONS

- *Seabed:* Nearest active hydrocarbon seepage occurs ~18,000ft to the southeast, and could hold potential to harbor chemosynthetic community development.
- *Seabed*: A minor seabed fault is located 900ft to the north of the proposed location, however it dips to the northeast and will not cross the well path.
- *Unit A – Seabed to Horizon H10:* **No Predicted Gas Hazards** within 1,500ft of the proposed location within this interval. **Negligible Shallow Water Flow Risk.**
- *Unit B – Horizon H10 to Horizon H20:* **No Predicted Gas Hazards** within 1,500ft of the proposed location within this interval. **Negligible Shallow Water Flow Risk.**
- *Unit C – Horizon H20 to Horizon H30:* **No Predicted Gas Hazards** within 1,500ft of the proposed location within this interval. Potential **Low Shallow Water Flow Risk** (*Unit C, Sub-unit C1*) from –4,910ft to –5,176ft below sea surface (607ft to 873ft below seabed) and (*Unit C, Sub-unit C3*) from –5,812ft to –6,123ft below sea surface (1,509ft to 1,820ft below seabed).
- *Unit D Uppermost – Horizon H30 to Horizon H30 plus 400ms:* Nearest **Predicted Gas Hazard** ~750ft to the northwest of the proposed location at the top of Unit D. This poses a **Negligible Gas Risk**.
- *Unit D Uppermost – Horizon H30 to Horizon H30 plus 400ms:* Potential **Low Shallow Water Flow Risk** from –6,789ft to –7,693ft below sea surface (2,486ft to 3,390ft below seabed).
- *Unit D Lowermost – Horizon H30 plus 400ms to Top Salt:* **Predicted Gas Hazard** ~1,200ft to the northwest of the proposed location. This poses a **Negligible Gas Risk**. **Negligible Shallow Water Flow Risk.**
- *Unit D Lowermost* – A normal fault crosses the proposed vertical well path at –8870ft below sea surface (4567ft below seabed). This fault may induce well circulation problems if pressures over hydrostatic are exerted by the drilling fluid column at this level (over-balanced).

We appreciate the opportunity to work with you on this project and look forward to continuing as your geohazards consultants. Please contact us if you have any questions or if we can be of further assistance.

Sincerely,
Gardline Surveys Inc.

Andrew Haigh
Geophysical Manager

Michael Pentland
President

Copies Submitted: 6 copies to Mr. Richard Weiland, BP America, Inc.

SECTION 4.0

BIOLOGICAL INFORMATION

4.1 Chemosynthetic Information

Since the proposed seafloor disturbing activities are in water depths greater than 400 meters, maps, analysis, and a statement prepared using the guidance in Attachment B of NTL No. 200-G20, "Deepwater Chemosynthetic Communities" are provided as attachments to Section 3.0.

The proposed wells will be drilled using a dynamically positioning semi-submersible rig, so there are no associated anchors, anchor chains or wire ropes. Features or areas that could support high-density chemosynthetic communities are not located within 1500 feet of each proposed muds and cuttings discharge location.

4.2 Topographic Features Information

MMS and the National Marine Fisheries Service (NMFS) have entered into a programmatic consultation agreement for Essential Fish Habitat, which requires that no bottom disturbing activities may occur within 500 feet of the no-activity zone of a topographic feature. If such bottom disturbing activities are proposed, the MMS is required to consult with the NMFS.

As specified in NTL No. 98-12, "Implementation of Consistent Biological Stipulation Measures in the Central and Western Gulf of Mexico", Atwater Valley Block 272 is not affected by a topographic feature.

4.3 Live Bottom (Pinnacle Trend) Information

MMS and the National Marine Fisheries Service (NMFS) have entered into a programmatic consultation agreement for Essential Fish Habitat that relates to bottom-disturbing activities occurring within 100 feet of any Pinnacle Trend feature with vertical relief greater than or equal to 8 feet. Any such proposed activities would require MMS to consult with the NMFS pursuant to the agreement.

Atwater Valley Block 272 is not located in the vicinity of a live bottom area.

4.4 Remotely Operated Vehicle (ROV) Surveys

Pursuant to NTL No. 2003-G03, operators may be required to conduct remotely operated vehicle (ROV) surveys during pre-spud and post-drilling operations for the purpose of biological and physical observations.

BP Exploration & Production, Inc. is familiar with the ROV survey and reporting provisions of the above referenced NTL and will, if required, conduct surveys immediately prior to commencing drilling operations on Well Location A and following the completion of drilling operations.

BP Exploration & Production Inc. would use Diamond's *Ocean Confidence* rig-based ROV equipped with video imaging capabilities. The survey pattern will consist of six transects centered on the well location with tracks extending approximately 100 meters away from

the well bearings of 30 degrees, 90 degrees, 150 degrees, 210 degrees, 270 degrees, and 330 degrees. The seafloor will be videotaped continuously along the track.

If the ROV survey is required, BP Exploration & Production Inc. will make biological and physical observations as described in NTL 2003-G003 and Form MMS 141 prior to commencing drilling operations and also following the completion of drilling operations but prior to moving the rig off location. The observations will be documented using Form MMS-141 or a facsimile and submitted to the MMS within 60 days after the second survey is completed.

4.5 Archaeological Information

Pursuant to NTL No. 2002-G01 lessees proposing bottom-disturbing activities in areas that have been identified as High Probability Shipwreck blocks or prehistoric areas must submit an archaeological report or a reference to such a report if it has already been provided to the Regional Supervisor.

Atwater Valley Block 272 is not located in a block designated as High Probability Shipwreck blocks or prehistoric areas.

SECTION 5.0

WASTES AND DISCHARGES INFORMATION

The Minerals Management Service (MMS), U.S. Coast Guard (USCG) and the U.S. Environmental Protection Agency (EPA) regulate the overboard discharge and/or disposal of operational waste associated with oil and gas exploration and production activities.

5.1 Discharges

The term *discharges* describes those wastes generated by the proposed activities that will be disposed of by releasing them into the waters of the Gulf of Mexico at the site where they are generated, usually after receiving some form of treatment before they are released, and in compliance with applicable NPDES permits or State requirements.

BP has requested coverage under the EPA Region VI NPDES General Permit GMG290000 for discharges associated with exploration activities in Atwater Valley Block 272, and will take applicable steps to ensure all offshore discharges associated with the proposed operations will be conducted in accordance with the permit.

The following table details the estimated discharges expected from the proposed activities:

Type of Waste Approximate Composition	Amount to be Discharged (volume or rate)	Maximum Discharge Rate	Treatment and/or Storage, Discharge Location, and Discharge Method
Water-based drilling fluids	2,000 bbl/well	Bulk discharge of mud in casing following TA	AT 272 Discharge through shunt line to 40' below waterline
Drill cuttings associated with water-based fluids	None	None	None
Drill cuttings associated with synthetic drilling fluids	10,000 bbl/well	100 bbl/hr	AT 272 Discharge through shunt line to 40' below waterline
Muds, cuttings and cement at the seafloor	WBM 48,000 bbl/well Cuttings – 2000 bbl/well	2000 bbl/hr	AT 272 Discharge at seafloor
Produced water	NA	NA	NA
Sanitary wastes	30 gals/person/day	Not applicable	AT 272 Treat with USCG certified MSD & discharge overboard
Domestic wastes	50 gal/person/day	Not applicable	AT 272 Remove floating solids and discharge overboard
Deck drainage	Dependant upon rainfall and rig/deck wash-down	Not applicable	AT 272 Remove free oil and grease and discharge overboard
Well treatment, workover or completion fluids	NA	NA	NA

Type of Waste Approximate Composition	Amount to be Discharged (volume or rate)	Maximum Discharge Rate	Treatment and/or Storage, Discharge Location, and Discharge Method
Uncontaminated fresh or seawater (non-contact cooling water)	25,000 bbl/day	Not applicable	AT 272 Discharge overboard
Desalinization Unit water	1000-10,000 bbl/day	Not applicable	AT 272 Discharge Overboard
Uncontaminated bilge water	None	None	None
Uncontaminated ballast water	As Needed	NA	AT 272 Discharge overboard
Misc discharges to which treatment chemicals have been added	None	Not applicable	None
Other misc discharges	Varied	Not applicable	AT 272 Discharged Overboard

5.2 Disposed Wastes

The term *disposed wastes* describes those wastes generated by the proposed activities that are disposed of by means other than by releasing them into the waters of the Gulf of Mexico at the site where they are generated. These wastes can be disposed of by offsite release, injections, encapsulation, or placement at either onshore or offshore permitted locations for the purpose of returning them back to the environment.

The following table details the estimated disposed wastes expected from the proposed activities:

Type of Waste Approximate Composition	Amount	Rate per Day	Name/Location of Disposal Facility	Treatment and/or Storage, Transport and Disposal Method[4]
Spent oil-based drilling fluids and cuttings	None	None	None	None
Spent synthetic-based drilling fluids	None	None	None	None
Oil-contaminated produced sand	NA	NA	NA	NA
Waste Oil	200 bbl/yr	0.5 bbl	ASCO	Pack in drums and transport by boat to shorebase
Norm-contaminated wastes	None	NA	NA	NA
Trash and debris	20 m^3	NA	Riverbirch Landfill, Avondale LA	Transport in storage bins on boats to shorebase
Chemical product wastes	100 bbls	2 bbl/day	Vendor or Omega Waste Management	Transport in barrels on boat to shorebase
Workover fluids-Not Discharged	None	NA	NA	NA

SECTION 6.0

OIL SPILL INFORMATION

6.1 Information to comply with the Oil Pollution Act of 1990 (OPA) and the Coastal Zone Management Act (CZMA)

6.1.1 Regional OSRP information – The activities proposed in this plan are covered by a Regional Oil Spill Response Plan (OSRP) that was approved by the MMS on August 10, 2004.

6.1.2 OSRO information – BP utilizes National Response Corporation (NRC) and Marine Spill Response Corporation (MSRC) 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.

6.1.3 Worst-case scenario comparison – The following table provides a worst-case scenario for the proposed activities in this plan as compared to the current OSRP:

Category	Current Regional OSRP WCD	Proposed Exploration Plan WCD
Type of Activity	Drilling	Drilling
Facility Surface Location	MC 587	AT 272
Facility Description	MODU	MODU
Distance to Nearest Shoreline *(in miles)*	48	86
Volume: Uncontrolled Blowout *(one day, bbls)*	300,000	193,744
Type of Liquid Hydrocarbon	Crude	Crude
API Gravity	Unknown	30°

Type of Storage Tank	Type of Facility	Tank Capacity (bbls)	Number of Tanks	Total Capacity (bbls)	Fluid Gravity (API)
Mud/Base Oil	Semi-submersible	1735.17	4	6940.68	Varies
Base Oil	Semi-submersible	2807.87	1	2807.87	Varies
Diesel Fuel	Semi-submersible	5656.67	2	11313.34	Varies
Diesel Fuel	Semi-submersible	5992.38	2	11984.76	Varies
Mud/Base Oil	Semi-submersible	745	4	2980	Varies
Mud/Base Oil	Semi-submersible	495	1	495	Varies

Type of Storage Tank	Type of Facility	Tank Capacity (bbls)	Number of Tanks	Total Capacity (bbls)	Fluid Gravity (API)
Mud/Base Oil	Semi-submersible	124	6	744	Varies
Mud/Base Oil	Semi-submersible	371	2	742	Varies
Mud/Base Oil	Semi-submersible	60	1	60	Varies
Mud/Base Oil	Semi-submersible	292	1	292	Varies
Mud/Base Oil	Semi-submersible	208	1	208	Varies
Mud/Base Oil	Semi-submersible	45	1	45	Varies
Jet Fuel	Semi-submersible	32.76	2	65.52	Varies
Diesel Fuel	Semi-submersible	192	1	192	Varies
Diesel Fuel	Semi-submersible	213	1	213	Varies
Lube Oil	Semi-submersible	115	2	230	Varies
Diesel Fuel	Semi-submersible	55	8	440	Varies

This project is located approximately 86 miles from the nearest shore point. Therefore, since the project is greater than 10 miles from shore, the project is defined as a "Far Shore" project.

Since BP has the capability to respond to the worst-case spill scenario included in its Regional OSRP approved on August 10, 2004, and since the worst-case scenario determined for this EP does not replace the worst-case scenario in our Regional OSRP, I hereby certify that BP Exploration & Production, Inc. 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.

SECTION 7.0

AIR EMISSIONS INFORMATION

Offshore air emissions related to the proposed activities result mainly from the drilling rig operations, helicopters and service vessels. These emissions occur mainly from combustion or burning of fuels and natural gas and from venting or evaporation of hydrocarbons. The combustion of fuels occurs primarily on diesel-powered generators, pumps or motors and from lighter fuel motors. Other air emissions can result from catastrophic events such as oil spills or blowouts.

Primary air pollutants associated with OCS activities are nitrogen oxides, carbon monoxide, sulphur oxides, volatile organic compound, and suspended particulate.

7.1 Calculating Emissions

Plan emissions associated with the proposed drilling operations utilizing the Diamond Ocean Confidence were calculated using the methodology, emission factors and worksheets in Form MMS-138.

7.2 Attachments to Section 7

- Form MMS-138 - Screening Questions and Summary Sheet for AT 272

EXPLORAT PLAN (EP)
AIR QUALITY SCREENING CHECKLIST

OMB Control No X-XXX
Expiration Date: Pending

COMPANY	BP Exploration & Production, Inc.
AREA	Atwater Valley
BLOCK	272
LEASE	OCS-G 16894
PLATFORM	NA
WELL	A-C
COMPANY CONTACT	Scherie Douglas
TELEPHONE NO.	281-366-6843
REMARKS	Drill and temporarily abandon 3 (three) exploratory wells

"Yes"	"No"	Air Quality Screening Questions
	X	Is any calculated Complex Total (CT) Emission amount (in tons) associated with your proposed exploration activities more than 90% of the amounts calculated using the following formulas: CT = 2400D2/3 for CO, and CT = 33.3D for the other air pollutants (wehre 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 H2S 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?

COMPANY	AREA	BLOCK	LEASE	PLATFORM	WELL
BP Exploration	Atwater Valley	272	OCS-G 16894	NA	A-C

Year	Emitted Substance				
	PM	SOx	NOx	VOC	CO
2005	65.46	300.29	2250.09	67.50	490.93
2006	65.46	300.29	2250.09	67.50	490.93
2007	65.46	300.29	2250.09	67.50	490.93
Allowable	2863.80	2863.80	2863.80	2863.80	66243.70

SECTION 8.0

ENVIRONMENTAL IMPACT ANALYSIS

8.1 Impact Producing Factors *(IPF's)*

Environmental Resources	Impact Producing Factors (IPFs) Categories and examples Refer to a recent GOM OCS Lease Sale EIS for a more complete list of IPFs					
	Emissions (air, noise, light, etc.)	Effluents (muds, cuttings, 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, H2S releases)	Other IPFs you identify
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)	
Chemosynthetic communities		X	(4) x			
Water quality		X			x	
Fisheries					x	
Marine mammals	(8) x				(8) x	
Sea turtles	(8) x				(8) x	
Air quality	(9)					
Shipwreck sites (known or potential)			(7)			
Prehistoric archaeological sites			(7)			
Vicinity of Offshore Location						
Essential fish habitat					(6) x	
Marine and pelagic birds					X	
Public health and safety					(5)	
Coastal and Onshore						
Beaches					(6) x	
Wetlands					(6) x	
Shore birds and coastal nesting birds					(6) x	
Coastal wildlife refuges					(6) x	
Wilderness areas					(6) x	
Other Resources You Identify						

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:*
   a. *4-mile zone of the Flower Garden Banks, or the 3-mile zone of Stetson Bank;*
   b. *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;*

c. *Essential Fish Habitat (EFH) criteria of 500 ft from any no-activity zone; or*
d. *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 Activities (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 MMS as being in water depths 400 meters or greater.*

5. *Exploration or production activities where H_2S 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 MMS 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 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*

8.2 Analysis

8.2.1 Site Specific at Offshore Location

8.2.1.1 Designated Topographic Features – There are no IPF's (including effluents, physical disturbances to the seafloor, and accidents) from the proposed activities that could cause impacts to topographic features. The site-specific offshore location of the proposed activities is outside the 3-mile zone of any identified topographic feature.

8.2.1.2 Pinnacle Trend Area Live Bottoms - There are no IPF's (including effluents, physical disturbances to the seafloor, and accidents) from the proposed activities that could cause impacts to pinnacle trend area live bottoms. The site-specific offshore location of the proposed activities is not in a pinnacle trend live bottom stipulated block.

8.2.1.3 Eastern Gulf Live Bottoms – The eastern gulf live bottoms are not in the vicinity of BP's proposed operations.

8.2.1.4 Chemosynthetic communities - The proposed activities would occur in deep water (water depths >400 meters). Therefore, IPF's (e.g. physical disturbances to the seafloor, effluents) from the proposed activities have the potential to cause impacts to chemosynthetic communities. However, the proposed activities would be conducted in accordance with NTL 2002-G08 Appendix D. Accordingly, BP has provided MMS with the required maps, analyses and statement(s) prepared using the guidance in Attachment B of NTL No. 2002-G20 "Deepwater Chemosynthetic Communities". As shown in the shallow hazards report accompanying this plan, and the seafloor amplitude map included in Section 3.0 of this plan, no indications of the presence of chemosynthetic communities are recognized on the 3-D seismic data at and around the proposed locations. The risk of chemosynthetic communities at or close to this location is therefore believed to be negligible.

8.2.1.5 Water Quality – Effluents and accidents from the proposed activities could potentially cause impacts to water quality. However, since all discharges will be made in accordance with a general National Pollutant Discharge Elimination System (NPDES) permit issued by the U.S. Environmental Protection Agency, operational discharges are not expected to cause significance adverse impacts to water quality. It is unlikely that an accidental oil spill release would occur from the proposed activities. In the event of such an accidental release, the water quality would be temporarily affected by the dissolved components and small droplets. Currents and microbial degradation would remove the oil from the water column or dilute the constituents to background levels.

8.2.1.6 Fisheries - An accidental oil spill that might occur as a result of the proposed action has the potential to cause some detrimental effects to fisheries. However, it is unlikely that an accidental surface or subsurface oil spill would occur from the proposed activities. If such a spill were to occur in open waters of the OCS proximate to mobile adult finfish or shellfish, the effects would likely be sub-lethal and the extent of damage would be reduced to the capability of adult fish and shellfish to avoid a spill, to metabolize hydrocarbons, and to excrete both metabolites and parent compounds. No adverse activities to fisheries are anticipated as a result of the proposed activities.

8.2.1.7 Marine Mammals – Marine mammals may be adversely impacted by several IPF's, including vessel traffic, noise, accidental oil spills, and loss of trash and debris, all of which could occur due to the proposed action. Chronic and sporadic sub-lethal effects could occur that may stress and/or weaken individuals of a local group or population and make them more susceptible to infection from natural or anthropogenic sources. Few lethal effects are expected from oil spills, chance collisions with service vessels and ingestion of plastic material. Oil spills of any size are estimated to be aperdiodic events that may contact cetaceans. Disturbance (e.g., noise) may stress animals, weaken their immune

systems, and make them more vulnerable to parasites and diseases that normally would not be fatal.

The net result of any disturbance would depend on the size and percentage of the population affected, ecological importance of the disturbed area, environmental and biological parameters that influence an animal's sensitivity to disturbance and stress, and the accommodation time in response to prolonged disturbance (Geraci and St. Aubin, et al., 2001). Sperm whales are one of 11 whale species that are hit commonly by ships (Laist et al., 2001). Collisions between OCS vessels and cetaceans within the project area are expected to be unusual events. No adverse impacts to endangered or threatened marine mammals are anticipated as a result of the proposed activities.

8.2.1.8 Sea Turtles - IPF's that could impact sea turtles include vessel traffic, noise, trash and debris, and accidental oil spills. Small numbers of turtles could be killed or injured by chance collision with service vessels or by eating indigestible trash, particularly plastic items, accidentally lost from drill rigs, production facilities and service vessels. Drilling rigs and project vessels produce noise that could disrupt normal behavior patterns and create some stress potentially making sea turtles more susceptible to disease. Oil spills and oil spill response activities are potential threats that could have lethal effects on turtles. Contact with oil, consumption of oil particles, and oil-contaminated prey could seriously affect individual sea turtles. Oil-spill-response planning and the habitat protection requirements of the Oil Pollution Act of 1990 should mitigate the threats.

Most OCS related impacts on sea turtles are expected to be sub-lethal. Chronic sub-lethal effects (e.g., stress) resulting in persistent physiological or behavioral changes and/or avoidance of effected areas could cause declines in survival or productivity, resulting in gradual population declines

No adverse impacts to endangered or threatened sea turtles are anticipated as a result of the proposed activities.

8.2.1.9 Air Quality – The proposed activities are located approximately 86 miles offshore. There would be a limited degree of air quality degradation in the immediate vicinity of the proposed activities. Air quality analysis (included in Section 7 of this plan) is below the MMS exemption level.

8.2.1.10 Shipwreck Sites (known or potential) – There are no known IPF's (including physical disturbances to the seafloor) from the proposed activities that could cause impacts to known or potential shipwreck sites. The proposed activities are not located in, or adjacent to, an OCS block designated by MMS as having high-probability for the occurrence of shipwrecks. Review of the Shallow Hazards Report (submitted with this plan in accordance with NTL 2002-G08, Appendix C, and NTL 98-20) indicates there are no known or potential shipwreck sites located within the survey area.

8.2.1.11 Prehistoric Archaeological Sites - There are no IPF's (including physical disturbances to the seafloor) from the proposed activities that could cause impacts to prehistoric archaeological sites, as the proposed activities are not located in, or adjacent to, an OCS block designated by MMS as having high-probability for the occurrence of prehistoric archaeological sites.

8.2.2 Vicinity of Offshore Location

8.2.2.1 Essential Fish Habitat - An accidental oil spill that might occur as a result of the proposed action has the potential to cause some detrimental effects on essential fish habitat. However, it is unlikely that an accidental surface or subsurface oil spill would occur from the proposed activities. If such a spill were to occur in open waters of the OCS proximate to mobile adult finfish or shellfish, the effects would likely be sub-lethal and the extent of damage would be reduced to the capability of adult fish and shellfish to avoid a spill, to metabolize hydrocarbons, and to excrete both metabolites and parent compounds. No adverse impacts to essential fish habitat are anticipated as a result of the proposed activities.

8.2.2.2 Marine and Pelagic Birds - An accidental oil spill that might occur as a result of the proposed action has the potential to impact marine and pelagic birds – birds could become oiled. However, it is unlikely that an accidental oil spill would occur from the proposed activities. No adverse impacts to marine and pelagic birds are anticipated as a result of the proposed activities.

8.2.2.3 Public Health and Safety – There are no anticipated IPF's (including any accidental H_2S releases) from the proposed activities that could impact public health and safety. In accordance with 30 CFR 250.417(c), BP has requested the area of proposed activities be classified as "H_2S absent".

8.2.3 Coastal and Onshore

8.2.3.1 Beaches - An accidental oil spill from the proposed activities could cause impacts to beaches. However, due to the distance from shore (approximately 86 miles) and the response capabilities that would be implemented, no significant adverse impacts are expected. Both the historical spill data and the combined trajectory/risk calculations referenced in the publication OCS EIS/EA MMS 2002-052 indicate there is little risk of contact or impact to the coastline and associated environmental resources. The activities proposed in the plan will be covered by our regional OSRP (refer to information submitted in Section 6 of this plan).

8.2.3.2 Wetlands - An accidental oil spill from the proposed activities could cause impacts to wetlands. However, due to the distance from shore (approximately 86 miles) and the response capabilities that would be implemented, no significant adverse impacts are expected. Both the

historical spill data and the combined trajectory/risk calculations referenced in the publication OCS EIS/EA MMS 2002-052 indicate there is little risk of contact or impact to the coastline and associated environmental resources. The activities proposed in the plan will be covered by our regional OSRP (refer to information submitted in Section 6 of this plan).

8.2.3.3 Shore Birds and Coastal Nesting Birds - An accidental oil spill from the proposed activities could cause impacts to shore birds and coastal nesting birds. However, due to the distance from shore (approximately 86 miles) and the response capabilities that would be implemented, no significant adverse impacts are expected. Both the historical spill data and the combined trajectory/risk calculations referenced in the publication OCS EIS/EA MMS 2002-052 indicate there is little risk of contact or impact to the coastline and associated environmental resources. The activities proposed in the plan will be covered by our regional OSRP (refer to information submitted in Section 6 of this plan).

8.2.3.4 Coastal Wildlife Refuges - An accidental oil spill from the proposed activities could cause impacts to coastal wildlife refuges. However, due to the distance from shore (approximately 86 miles) and the response capabilities that would be implemented, no significant adverse impacts are expected. Both the historical spill data and the combined trajectory/risk calculations referenced in the publication OCS EIS/EA MMS 2002-052 indicate there is little risk of contact or impact to the coastline and associated environmental resources. The activities proposed in the plan will be covered by our regional OSRP (refer to information submitted in Section 6 of this plan).

8.2.3.5 Wilderness Areas - An accidental oil spill from the proposed activities could cause impacts to coastal wilderness areas. However, due to the distance from shore (approximately 86 miles) and the response capabilities that would be implemented, no significant adverse impacts are expected. Both the historical spill data and the combined trajectory/risk calculations referenced in the publication OCS EIS/EA MMS 2002-052 indicate there is little risk of contact or impact to the coastline and associated environmental resources. The activities proposed in the plan will be covered by our regional OSRP (refer to information submitted in Section 6 of this plan).

8.2.3.6 Other Environmental Resources Identified – BP has not identified any other environmental resources other than those addressed above.

8.3 Impacts on Proposed Activities – The site-specific environmental conditions have been taken into account for the proposed activities and no impacts are expected as a result of these conditions.

A shallow hazards survey and shallow hazards assessment of any seafloor and subsurface geological or manmade features and conditions that may adversely affect

operations has been submitted in accordance with NTL 2002-G08, Appendix C and NTL 98-20. Based on the above report and analysis, BP has concluded there are no surface or subsurface geological or manmade features or conditions that may adversely affect the proposed activities.

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

8.5 Mitigation Measures – No mitigation measures other than those required by regulation and BP policy will be employed to avoid, diminish or eliminate potential impacts on environmental resources.

8.6 Consultation – No agencies or persons were consulted regarding potential impacts associated with the proposed activities.

8.7 References: - Although not always cited, the following were utilized in preparing the EIA:

- Hazard Survey prepared by Gardline Surveys Inc.
- MMS EIS – Lease Sale 157
- OCS EIS/EA MMS 2002-052
- NPDES Permit GMG290000
- Air Quality Review
- Regional Oil Spill Response Plan

SECTION 9.0

COASTAL ZONE CONSISTENCY

Under 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.

Issues identified in the Louisiana CZMP include the following: general coastal use guidelines, levees, linear facilities (pipelines); dredges soil deposition; shoreline modifications, surface alterations, hydrologic and sediment transport modifications; waste disposal; uses that result in the alteration of waters draining into coastal waters; oil, gas or other mineral activities; and air and water quality.

The following Louisiana guidelines are applicable to the proposed operations:

TOPIC	*GUIDELINE NO.*	*CROSS REFERENCE*
Air Quality	1.2	Section 7.0
Water Quality	1.2	Section 5.0
Permitting Authority	1.6	Sections 4.0 thru 8.0
Adverse Effects	1.7	Section 8.0
Multiple Use	1.9	Section 2.0
Waste Storage, Treatment and Disposal Facilities	8.1	Section 5.0
Hazardous Waste Storage, Treatment and Disposal	8.2	Section 5.0
Approved Disposal Sites	8.8	Section 5.0
Radioactive Waste	8.9	Section 5.0
Siting of Exploration, Production Activities	10.3	Sections 2.0 and 8.0
Access to Site	10.5	Section 2.0
Best Practical Techniques for Drilling/Production Sites	10.6	Sections 2.0 and 5.0
Drilling and Production Equipment Guidelines for Preventing Adverse Environmental Effects	10.10	Section 1.0
Effective Environmental Protection and Emergency or Contingency Plans	10.11	Sections 1.0 and 6.0

9.2 Attachments to Section 9.0

- Certificate of Coastal Zone Management Consistency for the State of Louisiana

COASTAL ZONE MANAGEMENT

CONSISTENCY CERTIFICATION

Initial Exploration Plan
Type of OCS Plan

Atwater Valley Block 272
Area and Block

OCS-G 16894
Lease Number

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

BP Exploration and Production, Inc.
Lessee or Operator

Sherie Douglas
Certifying Official

4/19/05
Date