McNeill, Catherine

From: Wilson, Leslie A <Leslie.Wilson@boem.gov>
Sent: Thursday, May 1, 2025 11:16 AM
To: Mickle, Sarila A; Mobile Coastal Mail
Subject: AL CZM Review and Comment of Plan Control N-10256
Attachments: N10256ALCZMltr.pdf

Good morning,

Attached is the BOEM, Plans Section letter. For your convenience, the link of the public plan placed on the BOEM website of the submitted plan Control N-10256
is: https://www.data.boem.gov/PDFDocs/Scan/PLANS/58/58322.pdf

Please email if there are any questions or issues.

Thank you,
Leslie

Leslie W. Wilson
Lead Regulatory Specialist, Plans Section
Office of Leasing and Plans
Gulf of America Region
(504) 736-2588
BOEM BUREAU OF OCEAN ENERGY MANAGEMENT

United States Department of the Interior

BUREAU OF OCEAN ENERGY MANAGEMENT
Gulf of Mexico OCS Region
1201 Elmwood Park Boulevard
New Orleans, LA 70123 2394

In Reply Refer To: GM 235D May 1, 2025

Alabama Department of Environmental Management
Attn: Ms. Sarila Mickle
Coastal Section
3664 Dauphin Street, Suite B
Mobile, Alabama 36608-1211

Dear Ms. Mickle,

In accordance with 30 CFR 550.232(a)(2), enclosed for your review and coastal zone consistency determination is the following plan and its accompanying documents:

Control #	-	N-10256
Type	-	Initial Development Operations Coordination Document
Lease(s)	-	OCS-G 25792, Block 292, Keathley Canyon Area (KC)
Operator	-	BP Exploration & Production Inc.
Description	-	Subsea Wells DC1, DC1 A, DC1 B, DC1 C, DC1 D, DC1 E, DC2, DC2 A, DC2 B, DC2 C, DC2 D, and DC2 E

Please refer to the above control number in all communication and correspondence concerning the subject plan.

Your review and comments are requested by June 13, 2025.

Sincerely,

Leslie Wilson
Plan Coordinator
Office of Leasing and Plans,
Plans Section

Enclosure

UNITED STATES GOVERNMENT
MEMORANDUM

April 30, 2025

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

Subject: Public Information copy of plan

Control #	-	N-10256
Type	-	Initial Development Operations Coordinations Document
Lease(s)	-	OCS-G25792 Block - 292 Keathley Canyon Area OCS- Block - 293 Keathley Canyon Area
Operator	-	BP Exploration & Production Inc.
Description	-	Kaskida FPU, DC1,DC1 A,DC1 B,DC1 C,DC1 D, DC1 E,DC2, DC2 A,DC2 B, DC2 C,DC2 D, DC2 E
Rig Type	-	Not Found

Attached is a copy of the subject plan.

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

Leslie Wilson
Plan Coordinator

Site Type/Name	Botm Lse/Area/Blk	Surface Location	Surf Lse/Area/Blk
????/DC1		2777 FSL, 6834 FEL	G25792/KC/292
????/DC2		2910 FSL, 3920 FWL	G25792/KC/292
FPSO/KASKIDA		6359 FSL, 3574 FWL	/KC/293
WELL/DC1 A	G25792/KC/292	2859 FSL, 6773 FEL	G25792/KC/292
WELL/DC1 B	G25792/KC/292	2737 FSL, 6740 FEL	G25792/KC/292
WELL/DC1 C	G25792/KC/292	2726 FSL, 6923 FEL	G25792/KC/292
WELL/DC1 D	G25792/KC/292	2800 FSL, 6734 FEL	G25792/KC/292
WELL/DC1 E	G25792/KC/292	2788 FSL, 6936 FEL	G25792/KC/292
WELL/DC2 A	G25792/KC/292	2992 FSL, 3981 FWL	G25792/KC/292
WELL/DC2 B	G25792/KC/292	2870 FSL, 4014 FWL	G25792/KC/292
WELL/DC2 C	G25792/KC/292	2859 FSL, 3831 FWL	G25792/KC/292
WELL/DC2 D	G25792/KC/292	2933 FSL, 4020 FWL	G25792/KC/292
WELL/DC2 E	G25792/KC/292	3921 FSL, 3818 FWL	G25792/KC/292

Betsy Cleland
Regulatory Lead - Paleogene
Gulf of America Region

BP Exploration & Production Inc.
501 Westlake Park Blvd – WL1
Houston, Texas 77079
Telephone: 281-773-9088
Email: Betsy.Cleland@bp.com

February 14, 2025

Via Email

Ms. Michelle Uli Picou
Plans Section Chief MS GM 1053C
Bureau of Ocean Energy Management
1201 Elmwood Park Blvd.
New Orleans, LA 70123-2394

Reference: Initial Development Operations Coordination Document
Kaskida Project
Keathley Canyon Blocks 292 and 293
Lease OCS-G 25792 and 26739 (Expired)
Keathley Canyon Block 292 Unit Agreement 754307002

Dear Ms. Picou:

BP Exploration & Production Inc. (bp) submits for your review and approval an Initial Development Operations Coordination Document (DOCD) for the Kaskida project, to drill six development wells with four back-up wells at two different well centers (DC1 and DC2), install a semi-submersible floating production unit (FPU) with 12 mooring lines, and associated subsea infrastructure in KC 292 and KC 293.
Enclosed please find the following:

- One digital copy each of the Initial DOCD proprietary and public information versions for BOEM and CZM reviews.

Please note that the supporting documentation for the DOCD was developed before issuance of Executive Order 14172 (January 20, 2025) changing the name from Gulf of Mexico to Gulf of America. Although the name Gulf of America has been applied (where appropriate) in the body of the DOCD submittal, references to Gulf of Mexico in the supporting documentation have not been changed.

If you have any questions or need additional information, please don't hesitate to contact the undersigned at Betsy.Cleland@bp.com, or at (281) 773-9088.

Sincerely,

Betsy Cleland
Regulatory Lead - Paleogene

P&O – projects
Kaskida

bp

Initial DOCD

Keathley Canyon Blocks 292 and 293
OCS-G 25792 and 26739 (Expired)
Public Copy

Applicability:	P&O – Kaskida
Approver:	John Boyle
Approval Date:	14 February 2025 DocuSigned by: John Boyle A0A60781AE2B4E8...
Author:	Betsy Cleland
Checker:	Vashtie Bajnath
Checker Date:	06-02-2025
Security Classification:	General
Document Number:	GM060-IR-PRM-000-00008
Revision Code:	B01
Reason for Issue:	IFU
Sector Code:	10
Next Review Date:	N/A

Revision History

Rev	Reason for Issue/Revisions	Author	Checker	Checker Date	Approver	Approval Date
B01	Issued for Use	BC	VB	02/06/25	JB	02/12/25

Operating Management System

OMS Sub-Element	OMS Sub-Element Title
7.1	Privilege to Operate

Reviewers

Name	Role	Date Reviewed
Walid Soliman	Subsea Engineering Manager	02/11/2025
Shanna Singh	Sr. Drilling Engineer	02/07/2025
Brandon James	Sr. Completions Engineer	02/07/2025
Werner Schinagl	Area Development Manager - Paleogene	02/11/2025
Janie Zhang	Geologist	02/07/2025

TABLE OF CONTENTS

Plan Contents

1.1 Description of Activities

BP Exploration & Production Inc. (bp) is submitting an Initial Development Operations Coordination Document (DOCD) for Keathley Canyon (KC) Blocks 292 (KC 292) and 293 (KC 293), Gulf of America (GoA, formerly known as the Gulf of Mexico), Outer Continental Shelf (OCS) G25792 (KC 292). The lease for KC 293 has expired and a Right of Use and Easement will be submitted under separate cover for activities proposed on Lease OCS G26739, KC 293. Under this DOCD, bp proposes to drill six development wells with four back-up wells at two different well centers (DC1 and DC2), install a semi-submersible floating production unit (FPU) with 12 mooring lines, and associated subsea infrastructure. The FPU is planned for production handling for up to 110 MBOPD from subsea tieback wells, and accommodations for 50 POB with 12 chain-polyester-chain mooring lines (no drilling rig). The FPU is located in the Keathley Canyon Area Block 293 in approximately 5,561' water depth, 220 miles southwest of Fourchon and 190 miles to the nearest shore point.

This DOCD is being submitted to drill, complete and produce six (6) development wells with four (4) re-spud wells in KC 292 at DC1 and DC2. A dynamically positioned (DP) drillship is anticipated to be on site for approximately 125 days per well for well drilling and 75 days for completion activities. Installation of the FPU and subsea infrastructure will be accomplished with a DP installation vessel. The installation of the proposed FPU and subsea equipment is estimated to be conducted between 2027 and 2028 with production commencing as early as 4Q 2028 and continuing until approximately 2053. There are 12 mooring anchors associated with this plan.

The information in this DOCD includes:

- At DC1, this DOCD is to include:
  - Three (3) development wells (DC1 – A, DC1 – B, DC1 - C)
  - Two (2) re-spud wells (DC1 – D, DC1 – E)
  - Four (4) well/manifold jumpers
  - One (1) subsea pump system
  - Four (4) flowline jumpers
  - Four (4) PLETS and holdback system
- At DC2, this DOCD is to include:
  - Three (3) development wells (DC2 – A, DC2 – B, DC2 - C)
  - Two (2) re-spud wells (DC2 – D, DC2 – E)
  - Four (4) well/manifold jumpers
  - One (1) flowline jumpers

1.2 History of Unit Leases

Keathley Canyon Area Block 292 Unit, Agreement 754307002, first became effective May 1, 2006, consisting of all of KC 335 OCS-G 17603, KC 290 OCS-G 19544, KC 291 OCS-G 19545, KC 336 OCS-G 19555, KC 246 OCS-G 25789, KC 247 OCS-G 25790, and KC 292 OCS-G 25792.

The KC 292 Plans history is as follows:

- bp received approval of an Initial Exploration Plan (N-8245) in December 2004 and received approval of a Supplemental Exploration Plan (S-7364) in December 2009. In those plans, bp proposed to drill Wells A, B, C, D, and E in Keathley Canyon Area Block 292, OCS-G 25792, Gulf of Mexico (GoM).
- bp received approval of an Initial Exploration Plan (N-8338) in March 2005. In that plan, bp proposed to drill Wells A, B, and C in Keathley Canyon Area Block 336, OCS-G 19555, GoM. These wells will be temporarily abandoned and a well cap will be installed on the wellhead.
- bp received approval of a Supplemental Exploration Plan (S-7451) to move location B and its mirror location C, and add location F and its mirror location G.

1.3 Location

Well Location Plats at a scale of 1-in = 2,000-feet on 8.5-in X 11-in sheets of paper that depicts the surface locations and water depths of the proposed wells are included in **Appendix B**. The Vicinity Maps and Bathymetry Plats are also included in **Appendix B**.

1.4 Safety and Pollution Prevention Measures

Safety and pollution prevention features utilized during drilling operations will include the use of appropriately designed casing and cement programs; appropriate subsea blowout preventers, diverters, and other associated well equipment, appropriate mud monitoring equipment and sufficient mud volumes for well control; and properly trained personnel as described in 30 CFR Part 250, Sub Parts C, D, E, F and O, 30 CFR Part 550, Sub Parts B and C, and as further described by Notices to Lessees (NTLs). Appropriate fire drills and abandon ship drills will be conducted, and navigational aids, lifesaving equipment, and all other shipboard safety equipment will be installed and maintained as mandated by the U.S. Coast Guard regulations contained in 33 CFR Part 144.

1.5 Storage Tanks and Production Vessels

Information regarding the storage tanks and production vessels located on the drilling rig and support vessels that will store oil, as defined at 30 CFR Part 254.6 are provided in the tables below. Only those tanks with a capacity of 25 barrels or more are included.

1.5.1 Storage Tanks – DP Drillship

Transocean Invictus Drillship

Type of Storage Tank	Type of Facility	Tank Capacity (bbls)	Tank Capacity (m3)	Number of Tanks	Fluid Gravity (API)
Port Storage	Drillship	14247	2268.5	1	38.2
Port Settling	Drillship	1411	224.7	1	38.2
Port Service	Drillship	1144	182.1	1	38.2
Center Storage	Drillship	14937	2378.5	1	38.2
Center Settling	Drillship	1334	212.4	1	38.2
Center Service	Drillship	1334	212.4	1	38.2
STBD Storage	Drillship	14247	2268.5	1	38.2
STBD Settling	Drillship	1411	224.7	1	38.2
STBD Service	Drillship	1144	182.1	1	38.2
Emergency Storage	Drillship	121	19.2	1	38.2
MDG L.O. Storage	Drillship	371	59	1	32
MDG L.O. Settling	Drillship	124	19.6	1	32
FWD Thr. L.O. Storage	Drillship	183	29.1	1	32

AFT Thr. L.O. Storage	Drillship	164	26.1	1	32
Base Oil	Drillship	5050	804.1	1	41

Atlas Drillship

Type of Storage Tank	Type of Facility	Tank Capacity (bbls)	Tank Capacity (m3)	Number of Tanks	Fluid Gravity (API)
Fwd Storage 1P	Drillship	12725.3	2023.2	1	35.0
Fwd Storage 1S	Drillship	12984.6	2064.4	1	35.0
Port Storage 2P	Drillship	1675.7	266.4	1	35.0
Port Storage 3P	Drillship	1322.9	210.3	1	35.0
Port Storage 4P	Drillship	2295.8	365.0	1	35.0
Port Settling	Drillship	612.4	97.4	1	35.0
Port Service 5	Drillship	309.9	49.3	1	35.0
Port Service 6	Drillship	277.0	44.0	1	35.0
Center Storage 2C	Drillship	6208.5	987.1	1	35.0
Center Storage 3C	Drillship	6208.5	987.1	1	35.0
Center Storage 4C	Drillship	4351.4	691.8	1	35.0
Center Settling	Drillship	681.9	108.4	1	35.0
Center Service 3	Drillship	479.2	76.2	1	35.0
Center Service 4	Drillship	374.4	59.5	1	35.0
STBD Storage 2S	Drillship	1675.7	266.4	1	35.0
STBD Storage 3S	Drillship	1322.9	210.3	1	35.0
STBD Storage 4S	Drillship	2295.8	365.0	1	35.0
STBD Settling	Drillship	612.4	97.4	1	35.0
STBD Service 1	Drillship	277.0	44.0	1	35.0
STBD Service 2	Drillship	309.9	49.3	1	35.0
Fuel Oil Overflow 1	Drillship	259.3	41.2	1	35.0
Fuel Oil Overflow 2P	Drillship	119.6	19.0	1	35.0
Fuel Oil Overflow 2C	Drillship	129.7	20.6	1	35.0
Fuel Oil Overflow 1	Drillship	119.6	19.0	1	35.0
EGEN Service Tank	Drillship	62.0	9.9	1	35.0
MDG L.O. Storage 1	Drillship	80.9	12.9	1	25.7
MDG L.O. Storage 2	Drillship	85.4	13.6	1	25.7
MDG L.O. Storage 3	Drillship	80.9	12.9	1	25.7
Mud Pump L.O. Storage	Drillship	42.2	6.7	1	25.7
FWD Thr. L.O. Storage	Drillship	162.7	25.9	1	25.7
AFT Thr. L.O. Storage	Drillship	68.4	10.9	1	25.7
Base Oil	Drillship	3,140.1	499.2	2	35.0

1.5.2 Storage Tanks Support Vessels - Updated

Type of Storage Tank	Type of Facility	Tank Capacity (bbls)	No. of Tanks	Total Capacity (bbls)	Fluid Gravity (API)
Fuel Oil	Supply Boat (Typical 280-feet)	450	16	7,200 bbls dependent on other cargo carried	31.14

1.6 Additional Measures

In addition to the safety, pollution prevention and early spill detection measures that may be required by applicable regulations, bp will rely on its Operating Management System (OMS) to help deliver safe and reliable operations. OMS is a system of interdependent activities that drive how bp will perform work and comply with internal and external standards and regulations. Within OMS, bp has also implemented a Safety Environmental Management System (SEMS) in accordance with 30 CFR 250 Subpart S, which provides a systematic way to identify risks, potential impacts, and compliance requirements that need to be managed.

The platform structure will be designed, fabricated and installed according to 30 CFR Part 250 Subpart I, and subsea pipeline architecture according to requirements in Subpart J. Pollution prevention systems include curbs, gutters, drip pans, and drains in deck areas to collect contaminants and oil drainage that is then piped to sump systems to reduce the risk of discharge of oil into offshore waters. The platform is protected by an automated shutdown system including SCSSV, and USV integrated with pipeline SDVs. The system is designed to shut in a well following a system shutdown signal. The wells and pipelines will be monitored by pressure sensors and automatic shut in systems. Wells will be monitored for casing pressure according to BSEE guidelines. Production Safety Systems are designed and will be installed according to 30 CFR Part 250 Subpart H, with further clarifications by Notices to Lessees. The systems will include the safety and environmental analysis procedures afforded by SAFDs and SAFE Charts developed according to requirements of API RP 14C, and other API Recommended Practices. Pollution prevention systems are developed to adhere to EPA NPDES permit discharge requirements and 30 CFR Part 250 Subpart C. Appropriate fire and abandon drills will be conducted, and navigational aids, lifesaving equipment, and other safety equipment are installed and maintained as mandated by the U.S. Coast Guard regulations contained in 33 CFR Part 144.

General Information

2.1 Applications and Permits

The table below provides information on the filing or approval status of the individual and/or site-specific Federal, State and local application approvals or permits that must be obtained to conduct the proposed activities.

Application / Permit	Issuing Agency	Status
General NPDES Permit	EPA	Pending Submittal
Initial Conceptual Plan	BSEE	Reviewed
Right of Use and Easement Application	BOEM	Pending Submittal
Conservation Information Document	BOEM	Pending Submittal
Applications for Permit to Drill (APD)	BSEE	Pending Submittal
Radioactive Tracer Permit/License	NRC	Pending Submittal
Deepwater Operations Plan	BSEE	Pending Submittal
Lease Term Pipeline Applications	BSEE	Pending Submittal
Measurement Surface Commingle Application	BSEE	Pending Submittal
Downhole Commingling Applications	BSEE	Pending Submittal
Applications for Permit to Modify (APM)	BSEE	Pending Submittal

2.2 Drilling Fluids

A table providing information on the types (including chemical constituents) and amounts of the drilling fluids that are planned to be used to drill the proposed wells is included below:

Drilling Fluids per Well (125 days/well)

Type of Drilling Fluid	Estimated Volume of Drilling Fluid to be Used Per Well
Water based (seawater, freshwater, barite)	165,000 bbls
Oil based (diesel, mineral oil)	NA
Synthetic based (internal olefin, ester)	30,000 bbls

NOTE: Water based mud (WBM) calculations include the option to re-spud the well. WBM volume is twice the anticipated amount required to drill to the TD of the surface casing. This value includes WBM and seawater as needed. Estimated volume is 82,500 bbls without re-spud.

2.3 New or Unusual Technology

In accordance with the definition of "new or unusual technology" set forth in 30 CFR § 550.200, activities in Keathley Canyon Blocks 292 and 293 will utilize the following:

- An installed Stemless Gate Valve (SGV) as a part of the riser or LMRP to trap pressure with MPD as required during well construction. The SGV will reduce BOP element cycles when trapping applied surface back pressure.
- Radioactive tracer beads and specifically, ProTechnic's ZeroWash™ beads, have been used extensively for tracing oil wells in the Gulf of America for over 20 years, and they were designed to mimic the operating characteristics of proppant. Radioactive material use and discharge are under the jurisdiction of the U.S. Nuclear Regulatory Commission who has licensed ProTechnics, in radioactive material license no. 42-26928-01, for 3 specific ZeroWash™ isotopes, namely Scandium-46, Iridium-192, and Antimony-124, all with half-lives of less than 120 days and of which only Scandium-46 and Iridium-192 are used in GoA.

The tracer beads are injected into the client proppant fluid while it gets pumped into the wellbore for uniform distribution throughout the formation. A spectral gamma logging tool is then used to detect where the isotope tagged fluid flowed. Analysis and processing of the detector data results in a representative picture of the formation. Any tracers that return in proppant fluids to MODU are properly disposed onshore as per the subcontractor NRC License under 10 CFR Chapter 1 and Section 1302(b)(2) compliance with NRC regulations for waste disposal.

- The Kaskida field is not classified as a high-pressure (HP) with a shut-in tubing pressure (SITP) of 14,927 psi nor a high-temperature (HT) application with a flowing temperature range of 270° - 275°F. However, the subsea equipment pressure rating with consideration to the bullhead (BH) margin will be greater than 15,000psi. In this regard, the subsea equipment pressure rating is defined as an HP application and in accordance with the HP/HT definition in 30 CFR 250.105. Therefore, bp intends to apply the HP/HT technology development and qualification in accordance with the applicable 30 CFR 250 regulations and BSEE NTLs 2019-G02 and 2019-G03. The Kaskida Project Conceptual Plan outlining the HP/HT plan has been reviewed by BSEE letter dated February 15, 2024, and will submit the individual New and Unusual Technology Barrier Equipment (NUTBE) Plans per the letter in **Appendix J.** The upper completion system, subsea BOP for the Atlas drillship, OWIR intervention and subsea well response (capping stack) will be rated as 20K equipment.

2.4 Bonding Information

The bonding requirements for the activities proposed in this DOCD are satisfied by an area-wide bond, furnished and maintained according to 30 CFR Part 556, Subpart I, and NTL No. 2015-N04 "General Financial Assurance" and to the extent under 30 CFR 556.901.

2.5 Oil Spill Financial Responsibility (OSFR)

BP Exploration & Production Inc., Operator No. 02481, has demonstrated oil spill financial responsibility for the facilities proposed in this DOCD according to 30 CFR Part 553 and NTL 2008-N05, "Guidelines for Oil Spill Financial Responsibility for Covered Facilities."

2.6 Deepwater Well Control Statement

BP Exploration & Production Inc., Operator No. 02481, has the financial capability to drill a relief well and conduct other emergency well control operations.

2.7 Suspensions of Production

Keathley Canyon Area Block 292 Unit, Agreement 754307002, is held by an SOP approval dated July 22, 2024.

2.8 Blowout Scenario

2.8.1 Blowout Scenario

The blowout scenario assumes that the pipe has been tripped out of the hole when a problem with the wellhead connector develops, resulting in the removal of the BOP stack. Due to the loss of riser margin, the well flows unrestrictedly. Day 1 worst case discharge (WCD) is 45,000 bopd and is included in **Appendix F** of this DOCD. The maximum duration of the blowout is estimated at 90 days (see relief well timing below). The rate profile associated with the well blowout over this 90-day period (also included in Appendix F) results in a potential worst case spill volume estimated at 4 mmbo.

2.8.2 The Potential for the Well to Bridge Over

While bridging is possible due to generally low formation strengths in the Gulf of America, no bridging was assumed in the 'worst case scenario' calculations. The open hole intervals experienced on each well have multiple formations open simultaneously. The modeling of the failure point of the weakest interval includes many variables, and using no bridging yields a maximum flow potential.

2.8.3 The Likelihood for Surface Intervention to Stop the Blowout

The likelihood for above-mudline intervention to stop a blowout is dependent on the failure mechanism. Depending on the circumstances, bp may address a failure of the BOP stack by repairing the control system via ROVs, replacing the BOPs, or adding a BOP on top of the current BOP stack. Failure of the wellhead or casing would be more difficult and require clear access to the well below the failure point in order to run drill pipe and/or tools in the well.

In addition to bp's internal well containment and emergency response planning, bp has contracted resources to assist in the event of a blowout. Further, bp is a member of the Marine Well Containment Company ("MWCC"), currently has access to MWCC's Interim Containment Response System ("ICRS") and will have full access to MWCC's Expanded Containment Response System when it is available.

2.8.4 The Availability and Timing of a Rig to Drill a Relief Well

The table below lists the Mobile Offshore Drilling Units (MODUs) capable of drilling a relief well. The estimated time to spud is 3 to 10 days, pending requirements to safely secure the current operations of the MODU, required material logistics, mobilization to location, and regulatory approvals. The possibility of drilling a relief well from a neighboring platform or land is not applicable to operations proposed in this DOCD; there is no existing infrastructure in the vicinity of Keathley Canyon Block 292.

Parameters	Black Lion (Main Derrick)	Black Hornet (Main Derrick)
Proposed Utility in Response	Wellbore Capping / Relief Well	Wellbore Capping / Relief Well
Current Location	GoA	GoA
Contract Expire Date	11/15/2027	06/15/2027
Rated WD (ft)	12K	12K
Rated TD (ft)	40K	40K
Rated BOPs (psi)	15K	15K
Derrick Capacity	4MM	4MM
Moor Type	DP	DP
Relevant Drill Package Limitations	SHDH4 connector	SHDH4 connector

The estimated time to drill a relief well is: 3 to 10 days to mobilize and spud, 60 days from spud to casing shoe above WCD zone, plus 30 days for ranging, intersection, and kill operation--for a total of 90 days.

2.8.5 Measures That Would Enhance the Ability to Prevent a Blowout

Measures employed to prevent a blowout include compliance with applicable regulations (30 CFR Parts 250 and 550), and current NTLs. Additional measures include the following:

1. Volume measurements relative to the well will be monitored at all times during all operations.
2. Flow checks before leaving bottom, after pulling into shoe, and before BHA enters stack.
3. BP representative shall observe well conditions prior to each trip and after well kills or testing.

4. BP representative shall be the only person authorized to initiate opening the well as part or at the conclusion of well control measures.
5. On rig JSA/contingency plan before running any non-shearable tools or pipe through the BOP stack.
6. BP has a 24/7 monitoring center, Regional Collaboration Center (RCC) (formerly referred to as the 'Houston Monitoring Center (HMC)'), located at bp's Westlake Campus. Through continuous monitoring, onshore staff have the ability to communicate issues they observe on the well with the Wells Superintendent and Wells Engineer, as well as the rig. The rig team can then make corrective actions as necessary.

In addition to the additional measures listed above, bp has adopted the following performance standards:

1. bp will use and will require its contractors involved in drilling operations to use, subsea blowout preventers (BOPs) equipped with no fewer than two blind shear rams and a casing shear ram on all drilling rigs under contract to BP for deepwater service operating in dynamic position mode. With respect to moored drilling rigs under contract to bp for deepwater drilling service using subsea BOPs, the subsea BOP will be equipped with two shear rams, which will include at least one blind shear ram and either an additional blind shear ram or a casing shear ram. The 20K BOP MODU used for completion operations has 2 blind shear rams.
2. Each time a subsea BOP from a moored or dynamically positioned drilling rig is brought to the surface and testing and maintenance on the BOP are conducted, bp will require that a third party verify that the testing and maintenance of the BOP were performed in accordance with manufacturer recommendations and API Std 53.

2.8.6 Measures That Would Reduce the Likelihood of a Blowout

Measures to reduce the likelihood of a blowout include compliance with applicable regulations (30 CFR Parts 250 and 550) and current NTLs. Additional measures:

1. Minimize any influx events to the wellbore by using the best pore pressure / fracture gradient predictions available, using down-hole tools when appropriate, such as PWD and/or LWD to monitor the wellbore and update pore pressure / fracture gradient predictions;
2. Management of change process is in place for all procedure changes;
3. A Well Control Response Guide is in place; and
4. With the integration of the Regional Collaboration Center (RCC) (formerly referred to as the 'HMC'), BP has staff monitoring wells 24/7. Having a monitoring center away from the rig in a controlled environment gives BP the opportunity to evaluate data real time and communicate issues to the Wells Superintendent and Wells Engineer, as well as the rig.

2.8.7 Measures Which Would Enhance the Ability to Conduct Early Intervention

Measures to enhance the ability to conduct early intervention in addition to the regulation and NTL requirements include:

1. Possible relief well locations have been identified and screened for general acceptability. In the event of a blow out or other event necessitating a relief well, data will be collected post-event to ensure that previously identified relief well locations are still valid, or to assist in determining alternate relief well locations if required.
2. Wellhead equipment and sufficient casing is identified and available for a relief well.
3. A rig(s) is identified and available for a relief well.
4. A Well Control Response Guide is in place.
5. An Incident Management System (IMS) is in place.
    - The BP IMS is comprised of government-approved plans covering various scenarios; Incident Management Teams are trained annually in the Incident Command System, which is a part of the National Incident Management System; bp has access to response capability through various contractors and technical specialists; and to predesignated facilities, where the teams can provide adequate oversight to the response.

2.8.8 Other Measures

All proposed activities and facilities in this DOCD will be covered by the GoM Regional OSRP filed by BP America Inc. (Operator No. 21372) under cover letter dated October 7, 2024, on behalf of several companies listed in the plan including BP Exploration & Production Inc. (Operator No. 02481). The OSRP was confirmed in compliance and approved by BSEE on January 10, 2025.

Geological and Geophysical Information

3.1 Geological Description

A brief geological description of Kaskida region is included in **Appendix C** in the "Proprietary Information" copies of this DOCD.

3.2 Structure Contour Maps

Current structure contour maps are included in **Appendix C** in the "Proprietary Information" copies of this DOCD.

3.3 Interpreted 2-D and/or 3D Seismic Lines

Migrated and annotated 3-D seismic lines with depth scale within 152 meters (500 feet) of the proposed surface locations are enclosed with the site clearance letters included in **Appendix C** in the "Proprietary Information" copies of this DOCD.

3.4 Geological Structure Cross-Section Maps

Interpreted geological structure cross-section maps of each proposed well location are included in **Appendix C** in the "Proprietary Information" copies of this DOCD.

3.5 Shallow Hazards Report

Autonomous Unmanned Vehicle (AUV) site surveys were conducted in 2008 over Blocks 246-248, 290-292, 335-336, and in 2023 over Blocks 249 and 293 and portions of Blocks 248, 250, 292, 294, and 336-338, Keathley Canyon Area.

An AUV Hazard Survey Report of Blocks 246-248, 290-292, and 335-336, Keathley Canyon Area, was submitted with the previously filed Supplemental Exploration Plan (S-7364).

A geohazards assessment was generated in 2024 based on the 2023 acquisition data to support FPU placement, entitled "Geohazards and Archaeological Assessment, Blocks 249, 293, and Vicinity, Keathley Canyon Area, Gulf of Mexico", by Geoscience Earth & Marine Services (GEMS), Project No. 1223-3229, and is included in **Appendix C** of this DOCD.

An integrated AUV and 3D seismic shallow hazards study was prepared in 2024, "Integrated Shallow Hazards Assessment, Blocks 246-248, 290-292, and 335-336, Keathley Canyon Area, Gulf of Mexico", by Geoscience Earth & Marine Services (GEMS), Project No. GHZ3282, and is included in **Appendix C** of this DOCD.

3.6 Shallow Hazards Assessments (Site Clearance Letters)

The shallow hazards assessments (site clearance letters) that evaluate the seafloor and subsurface geologic and manmade features and conditions, prepared in accordance with NTL 2022-G01, for the proposed surface locations for the five (5) DC1 wells: A, B, C, D and E locations and five (5) DC2 wells: A, B, C, D and E locations along with the site clearance for the mooring pre-lay are included in **Appendix C** of this DOCD.

3.7 High Resolution Seismic Lines

Seismic sections through the proposed well locations for the proposed ten (10) wells from DC1 and DC2 are included in **Appendix C** in the "Proprietary Information" copies of this DOCD.

Hydrogen Sulfide (H_2S) Information

4.1 Hydrogen Sulfide (H_2S) Information

Anticipated H_2S concentration is 0 ppm. Kaskida project had the estimated H2S concentration and area classification in the KC292-336 Supplemental Exploration Plan (S-7451), approved October 21, 2011, as "H_2S absent".

4.2 H_2S Contingency Plan

Based on previous drilling, no H_2S is known to occur in the project area. It is not expected that H2S will be encountered during the operations proposed in this DOCD. Based on previous BOEM "H_2S absent" classification (October 21, 2011 - KC292-336 Supplemental Exploration Plan approval letter, S-7451), it is not anticipated that a contingency plan will be required.

4.3 Modeling Report

Based on previous drilling, no H_2S is known to occur in the project area. Therefore, no modeling report is required.

Mineral Resource Conservation Information

5.1 Technology and Reservoir Engineering Practices and Procedures

Technology and reservoir engineering practices and procedures are included in the "Proprietary Information" copies of this DOCD.

5.2 Technology and Recovery Practices and Procedures

Technology and recovery practices and procedures are included in the "Proprietary Information" copies of this DOCD.

5.3 Reservoir Developments

Reservoir developments are included in the "Proprietary Information" copies of this DOCD.

Biological and Physical Information

6.1 Benthic Communities Report

The BOEM requires site-specific surveys and reviews for proposed bottom-disturbing actions in water depths greater than 300-m to judge the potential of the region for supporting high density benthic communities. NTL No. 2009–G40 formalized the process. bp has conformed to this requirement and has located wells, pipeline routes, and mooring anchor piles to avoid potential sites for benthic communities during the deepwater development project described by this plan.

The Kaskida project is located in water depths greater than 300-m; therefore, there is the potential for high-density benthic communities to be present. Site Clearance Letters in **Appendix C** provide a current review of available data confirming the absence of high-density benthic communities within the prescribed distances from the proposed well locations for Drill Centers 1 and 2, and FPU anchor mooring piles.

6.2 Topographic Features Map

Activities proposed in this DOCD do not fall within 305 meters (1000 feet) of a topographic "No Activity Zone;" therefore, no map is required per NTL No. 2009-G39, "Biologically Sensitive Underwater Features and Areas."

6.3 Topographic Features Statement (Shunting)

Activities proposed under this DOCD will be conducted outside all Topographic Feature Protective Zones; therefore, shunting of drill cuttings and drilling fluids is not required per NTL No. 2009-G39, "Biologically Sensitive Underwater Features and Areas."

6.4 Live Bottom (Pinnacle Trend) Information

Live Bottom (Pinnacle Trend) Stipulation in NTL No. 2009-G39 does not apply to these leases; therefore, a map is not required.

6.5 Live Bottom (Low Relief) Map

Live Bottom (low relief) Stipulation in NTL No. 2009-G39 does not apply to these leases; therefore, a map is not required.

6.6 Biologically Sensitive Underwater Features and Areas

The intent of NTL No. 2009-G39 is to protect biologically sensitive features and areas in water depths less than 300-meters (984-feet). The proposed well locations in Keathley Canyon Area Block 292 are in water depths greater than 6,000-ft. The Site Clearance Analysis conducted by bp, based on data from an Autonomous Underwater Vehicle (AUV) survey, did not identify any similar features within a 2,000-ft radius of the proposed well locations (Map 6, Hazard Map, Fugro 2009). All proposed bottom-disturbing activities will therefore occur outside 30-meters (100-feet) of any potentially sensitive biological features.

6.7 Remotely Operated Vehicle (ROV) Monitoring Survey Plan

Keathley Canyon Area Blocks 292 and 293 fall within Grid 7. It has been determined by the BOEM that sufficient remotely operated vehicle (ROV) information has been gathered in Grid 7; therefore, no ROV monitoring survey is required.

6.8 Threatened or Endangered Species, Critical Habitat and Marine Mammal Information

Endangered or Threatened species that may occur in the project area and/or along the northern Gulf Coast are listed in the table below. The table also indicates the location of critical habitat (if designated in the Gulf of America (GoA). Critical habitat is defined as (1) specific areas within the geographical area occupied by the species at the time of listing, if they contain physical or biological features essential to conservation, and those features may require special management considerations or protection; and (2) specific areas outside the geographical area occupied by the species if the agency determines that the area itself is essential for conservation. The NMFS has jurisdiction for ESA-listed marine mammals (cetaceans), sea turtles, and fishes in the Gulf of America. The USFWS has jurisdiction for ESA-listed birds, the West Indian manatee (Trichechus manatus), and sea turtles while on their nesting beaches.

Federally listed Endangered and Threatened species potentially occurring in the project area and along the northern Gulf Coast. Adapted from: U.S. Fish and Wildlife Service (2020) and National and Oceanic Atmospheric Administration Fisheries (2020).

Species	Scientific Name	Status	Potential Presence		Critical Habitat Designated in Gulf of America
			Project Area	Coastal	
Marine Mammals					
Rice's whale[1]	*Balaenoptera ricei*	E	X	--	None
Sperm whale	*Physeter macrocephalus*	E	X	--	None
West Indian manatee	*Trichechus manatus*[2]	T	--	X	Florida (Peninsular)
Sea Turtles					
Loggerhead turtle	*Caretta caretta*	T,E[3]	X	X	Nesting beaches and nearshore reproductive habitat in Mississippi, Alabama, and Florida (Panhandle); *Sargassum* habitat including most of the central & western Gulf of Mexico.
Green turtle	*Chelonia mydas*	T	X	X	None
Leatherback turtle	*Dermochelys coriacea*	E	X	X	None
Hawksbill turtle	*Eretmochelys imbricata*	E	X	X	None
Kemp's ridley turtle	*Lepidochelys kempii*	E	X	X	None
Birds					
Piping Plover	*Charadrius melodus*	T	--	X	Coastal Texas, Louisiana, Mississippi, Alabama, and Florida (Panhandle)
Whooping Crane	*Grus americana*	E	--	X	Coastal Texas (Aransas National Wildlife Refuge)
Black-capped Petrel	*Pterodroma hasitata*	E	X	--	None
Rufa Red Knot	*Calidris canutus rufa*	T	--	X	None
Fishes					
Oceanic whitetip shark	*Carcharhinus longimanus*	T	X	--	None

Species	Scientific Name	Status	Potential Presence		Critical Habitat Designated in Gulf of America
			Project Area	Coastal	
Giant manta ray	*Mobula birostris*	T	X	X	None
Gulf sturgeon	*Acipenser oxyrinchus desotoi*	T	--	X	Coastal Louisiana, Mississippi, Alabama, and Florida (Panhandle)
Nassau grouper	*Epinephelus striatus*	T	--	X	None
Smalltooth sawfish	*Pristis pectinata*	E	--	X	Southwest Florida
Invertebrates					
Elkhorn coral	*Acropora palmata*	T	--	X	Florida Keys and the Dry Tortugas
Staghorn coral	*Acropora cervicornis*	T	--	X	Florida Keys and the Dry Tortugas
Pillar coral	*Dendrogyra cylindrus*	T	--	X	Southeast Florida and Florida Keys, Puerto Rico, St. Thomas, St. John, St. Croix, and Navassa Island
Rough cactus coral	*Mycetophyllia ferox*	T	--	X	Southeast Florida and Florida Keys, Puerto Rico, St. Thomas, St. John, St. Croix, and Navassa Island
Lobed star coral	*Orbicella annularis*	T	--	X	Southeast Florida and Florida Keys, Puerto Rico, St. Thomas, St. John, St. Croix, Navassa Island, East and West Flower Garden Banks, Rankin Bright Bank, Geyer Bank, and McGrail Bank
Mountainous star coral	*Orbicella faveolata*	T	--	X	Southeast Florida and Florida Keys, Puerto Rico, St. Thomas, St. John, St. Croix, Navassa Island, East and West Flower Garden Banks, Rankin Bright Bank, Geyer Bank, and McGrail Bank
Boulder star coral	*Orbicella franksi*	T	--	X	Southeast Florida and Florida Keys, Puerto Rico, St. Thomas, St. John, St. Croix, Navassa Island, East and West Flower Garden Banks, Rankin Bright Bank, Geyer Bank, and McGrail Bank
Panama City crayfish	*Procambarus econfinae*	T	--	X	South-central Bay County, Florida
Queen conch	*Aliger gigas*	T	--	X	None
Terrestrial Mammals					
Beach mice (Alabama, Choctawhatchee, Perdido Key, St. Andrew)	*Peromyscus polionotus subsp. Ammobates, allophrys, trissyllepsis, and peninsularis, respectively*	E	--	X	Alabama and Florida (Panhandle) beaches
Florida salt marsh vole	*Microtus pennsylvanicus dukecampbelli*	E	--	X	None

E = Endangered; T = Threatened; X = potentially present; -- = not present.

1 In 2021, the National Marine Fisheries Service recognized that what had previously been accepted as a subspecies of the Bryde's whale is actually a separate species. The reclassification is formerly recognized under 86 FR 47022 effective date 22 October 2021 as the Rice's whale (*Balaenoptera ricei*).

2 There are two subspecies of West Indian manatee: the Florida manatee (*T. m. latirostris*), which ranges from the northern Gulf of America to Virginia, and the Antillean manatee (T. m. manatus), which ranges from northern Mexico to eastern Brazil. Only the Florida manatee subspecies is likely to be found in the northern Gulf of America.

3 The Northwest Atlantic Ocean Distinct Population Segment (DPS) of loggerhead turtles is designated as Threatened (76 Federal Register [*FR*] 58868). The National Marine Fisheries Service and the U.S. Fish and Wildlife Service designated critical habitat for this DPS, including beaches and nearshore reproductive habitat in Mississippi, Alabama, and the Florida Panhandle as well as *Sargassum* spp. habitat throughout most of the central and western Gulf of America (79 *FR* 39756 and 79 *FR* 39856)

Coastal Endangered or Threatened species that may occur along the U.S. Gulf Coast include the West Indian manatee, Piping Plover (Charadrius melodus), Ruda Red Knot (Calidris canutus rufa) Florida salt marsh vole, Panama City crayfish, Whooping Crane (Grus americana), Gulf sturgeon (Acipenser oxyrinchus desotoi), smalltooth sawfish (Pristis pectinata), Queen conch (Aliger gigas) and four subspecies of beach mouse. Critical habitat has been designated for all of these species (except the Florida salt marsh vole, Rufa Red Knot, and Queen conch) as indicated in Table 6 and discussed in individual sections. Two other coastal bird species (Bald Eagle [Haliaeetus leucocephalus] and Brown Pelican [Pelecanus occidentalis]) are no longer federally listed as Endangered or Threatened.

Five sea turtle species, the Rice's whale (Balaenoptera ricei), sperm whale (Physeter macrocephalus), oceanic whitetip shark (Carcharhinus longimanus), and giant manta ray (Mobula birostris), and the Black-capped Petrel (Pteredroma hasitata) are the only Endangered or Threatened species that could potentially occur within the project area. The listed sea turtles include the leatherback turtle (Dermochelys coriacea), Kemp's ridley turtle (Lepidochelys kempii), hawksbill turtle (Eretmochelys imbricata), loggerhead turtle (Caretta caretta), and green turtle (Chelonia mydas) (Pritchard, 1997). Effective 11 August 2014, NMFS has designated certain marine areas as critical habitat for the Northwest Atlantic Distinct Population Segment (DPS) of the loggerhead sea turtle. No critical habitat has been designated in the Gulf of America for the leatherback turtle, Kemp's ridley turtle, hawksbill turtle, green turtle, or the sperm whale.

Four Endangered mysticetes (blue whale [*Balaenoptera musculus*], fin whale [Balaenoptera physalus], North Atlantic right whale [*Eubalaena glacialis*], and sei whale [*Balaenoptera borealis*]) have been reported in the Gulf of America, and are considered rare or extralimital (Würsig et al., 2017). These species are not included in the most recent NMFS stock assessment report (Hayes et al., 2022) nor in the most recent BOEM multisale EIS (BOEM, 2017); therefore, they are not considered further in the EIA.

The Rice's whale exists in the Gulf of America as a small, resident population. This species was formally known as a subspecies to the Bryde's whale (*Balaenoptera edeni brydei*) until a DNA study identified it as a separate species (Rosel et al., 2021). It is the only baleen whale known to be resident to the Gulf of America. The species is severely restricted in range, being found only in the northeastern Gulf in the waters of the DeSoto Canyon (Waring et al., 2016, Rosel et al., 2021). However, recent work by Soldevilla et al. (2022a) suggests the range may be broader than previously thought.

In several recent acoustic studies in the Gulf of America (Soldevilla et al., 2022a,b; 2024), all Bryde's whale complex individuals are assumed to be Rice's whales. However, Bryde's whales have a global tropical and sub-tropical range that can include the Gulf of America. Moreover, in the latest NMFS Rice's whale Marine Mammal Stock Assessment Report (Hayes et al., 2023), all previous data of Gulf of America Bryde's whales from studies that pre-dated the Rosel et al. (2021) study that determined that Rice's whales are a distinct species were now assumed to all be Rice's whales. However, it is unclear on what percentage of Bryde's whale complex individuals that live or previously lived in Gulf of America are Rice's whales vs Bryde's whales due to having no DNA studies that analyzed a representative population of Gulf of America Bryde's whale complex individuals.

The giant manta ray could occur in the project area but is most commonly observed in the Gulf of America at the Flower Garden Banks. The Nassau grouper (*Epinephelus striatus*) has been observed in the Gulf of America at the Flower Garden Banks but is most commonly observed in shallow tropical reefs of the Caribbean and is not expected to occur in the project area. The smalltooth sawfish is a coastal species limited to shallow areas off the west coast of Florida and is not expected to occur in the project area. The Panama City crayfish (Procambarus econfinae) is a coastal species in south-central Bay County, Florida and is not expected to occur in the project area.

Seven Threatened coral species are known from the northern Gulf of America: elkhorn coral (*Acropora palmata*), staghorn coral (*Acropora cervicronis*), lobed star coral (*Orbicella annularis*), mountainous star coral (*Orbicella faveolata*), boulder star coral (*Orbicella franksi*), pillar coral (*Dendrogyra cylindrus*), and rough cactus coral (*Mycetophyllia ferox*). These corals are shallow water, zooxanthellate species (containing symbiotic photosynthetic zooxanthellae which contribute to their nutritional needs) and so are not present in the deepwater project area.

There are no other Threatened or Endangered species in the Gulf of America that are likely to be adversely affected by either routine or accidental events. Additional information can be found in BP's Environmental Impact Analysis attached as **Appendix I**. Archaeological Report

With the recent Archaeological Resource Protection CFR changes, all blocks in the Kaskida DOCD area have an Archaeological assessment and are included in **Appendix C** of this DOCD.

Waste and Discharge Information

7.1 Projected Generated Wastes

A table providing information on the projected solid and liquid wastes likely to be generated by the proposed activities is included in **Appendix D**.

7.2 Projected Ocean Discharges

A table providing information on the projected ocean discharges likely to be generated during the proposed activities is included in **Appendix D**.

7.3 Modeling Report

No waste modeling report is required for this DOCD.

Air Emissions Information

8.1 Screening Questions

Yes	No	Screening Questions for DOCD's
X		Is any calculated Complex Total (CT) Emission amount (tons) associated with your proposed development and production activities more than 90% of the amounts calculated using the following formulas: CT = 3400D2/3 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		Does or will the facility complex associated with your proposed development and production activities process production from eight or more wells?
	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 in excess of the criteria set forth under 30 CFR 250.1105(a)(2) and (3)?
	X	Do you propose to burn produced hydrocarbon liquids?
	X	Are your proposed development and production activities located within 25 miles (40 kilometers) from shore?
	X	Are your proposed development and production activities located within 124 miles (200 kilometers) of the Breton Wilderness Area?

8.2 Emissions Worksheet

BOEM's Form-0139 has been populated with the Kaskida project's emissions scenarios and is provided in **Appendix E**. These tables list the equipment associated with each operation, the fuel feed rate and the calculated maximum short term (hourly) and annual mass emission rates. The final page of the spreadsheet includes a calculation of the modeling exemption thresholds based on project information. A summary of the Kaskida project's proposed annual emissions for each year and pollutant are provided in Table 1-1. The data presented indicate that the calculated emissions for the project are below the exemption thresholds for all BOEM listed pollutants, except NOx. The calculated NOx emissions for the years 2028 through 2035 are projected to be above the exemption formula threshold (shown as "Allowable" row in the table), thus requiring further analyses of potential emissions impacts. The year 2028 is projected to represent the maximum annual emissions and served as the highest evaluation year for the analyses described herein.

8.3 Emission Reductions Measures

BP did not utilize any emission reduction measures in calculating emissions for the project. All emissions were calculated using the default values in the BOEM Form 0139.

8.4 Verification of Non-Default Emission Factors

No non-default emissions factors were used.

8.5 Distance to Shore for Emission Exemption Thresholds (EET)

The distance to shore in statute miles is based on the same coordinate system used in the lease sale documents for the lease.

8.6 Non-Exempt Activities

The summary Table below shows proposed emissions calculated per the exemption threshold formulas in 30 CFR 550.303(d). BP proposes NOx emissions higher than the exemption levels in 30 CFR 550.303(d).

COMPANY	AREA	BLOCK	LEASE	FACILITY	WELL
BP Exploration & Production Inc.	Keathley Canyon	KC 292, 293	OCS-G-25792, OCS-G 26739-Expired	Kaskida	DC1-A, DC1-B, DC1-C, DC1-D, DC1-E, DC2-A, DC2-B, DC2-C, DC2-D, DC2-E

Year	Facility Emitted Substance								
	TSP	PM10	PM2.5	SOx	NOx	VOC	Pb	CO	NH3
2026	91.14	54.99	53.34	1.33	2183.64	488.09	0.01	342.50	0.64
2027	215.88	130.24	126.34	3.14	5172.25	574.02	0.02	811.25	1.51
2028	447.39	271.09	263.16	10.55	11935.44	894.35	0.04	3178.26	3.02
2029	295.12	181.49	176.35	9.09	8769.13	802.10	0.03	2739.30	1.91
2030	295.12	181.49	176.35	9.09	8769.13	802.10	0.03	2739.30	1.91
2031	295.12	181.49	176.35	9.09	8769.13	802.10	0.03	2739.30	1.91
2032	295.12	181.49	176.35	9.09	8769.13	802.10	0.03	2739.30	1.91
2033	295.12	181.49	176.35	9.09	8769.13	802.10	0.03	2739.30	1.91
2034	295.12	181.49	176.35	9.09	8769.13	802.10	0.03	2739.30	1.91
2035	295.12	181.49	176.35	9.09	8769.13	802.10	0.03	2739.30	1.91
Allowable	6193.80			6193.80	6193.80	6193.80		110786.68	

(maximum year highlighted in yellow)

The calculated NOx emissions for the years 2028 through 2035 are projected to be above the exemption formula threshold (shown as "Allowable" row in the table), thus requiring further analyses of potential emissions impacts. BP used an approved air quality model to demonstrate that worst case total complex modeled impacts of NOx/NO2 did not exceed relevant thresholds (i.e.- Significance Impact Levels (SIL) and/or National Ambient Air Quality Standards (NAAQS). This modeling study was updated using the revised assumptions in this plan. Year 2028 is projected to represent the maximum annual emissions and served as the highest evaluation year. The full modeling assessment in **Appendix E**.

The updated modeling analyses performed and available in **Appendix E**. demonstrate that the Kaskida project with the projected emissions sources operating at their assumed maximum emission rates will comply with the applicable NO2 NAAQS at the coastline receptors and will not exceed the annual Significant Impact Level at any modeled receptor location.

8.7 Hydrogen Sulfide

The requirements related to hydrogen sulfide (H2S) are not repeated here as they are addressed in section 4 of the Plan.

8.8 Environmental Impact Analysis (EIA)

The requirements related to EIA are not repeated here as they are addressed in **Appendix** I of this Plan.

Oil Spill Information

9.1 Oil Spill Response Planning

9.1.1 Regional OSRP Information

All proposed activities and facilities in this DOCD will be covered by the GoM Regional OSRP submitted by BP America Inc (Operator No. 21372) under cover letter dated October 7, 2024, on behalf of several companies listed in the plan including BP Exploration & Production Inc. (Operator No. 02481). The OSRP was confirmed in compliance and approved by BSEE on January 10, 2025.

BP has adopted additional performance standards:

a. Provisions to maintain access to a supply of dispersant and fire boom for use in the event of an uncontrolled long-term blowout for the length of time required to drill a relief well;

b. Contingencies for maintaining an ongoing response for the length of time required to drill a relief well;

c. Description of measures and equipment necessary to maximize the effectiveness and efficiency of the response equipment used to recover the discharge on the water's surface, including methods to increase encounter rates;

d. Information regarding remote sensing technology and equipment to be used to track oil slicks, including oil spill detection systems and remote thickness detection systems (e.g., X-band/infrared systems);

e. Information regarding the use of communication systems between response vessels and spotter personnel;

f. Shoreline protection strategy that is consistent with applicable area contingency plans; and

g. For operations using a subsea BOP or a surface BOP on a floating facility, a discussion regarding strategies and plans related to source abatement and control for blowouts from drilling.

9.1.2 Spill Response Sites

Primary Response Equipment Location	Preplanned Staging Location(s)
Tampa, FL; Pascagoula, MS; Houma, LA.; Leeville, LA; Morgan City, LA; Lake Charles, LA.; Venice, LA; Galveston, TX; Ingleside, TX.	Fourchon, LA.

9.1.3 OSRO Information

bp is a member of the Marine Spill Response Corporation (MSRC) and Clean Gulf Associates (CGA) and would utilize said Oil Spill Response Organization (OSRO) personnel and equipment in the event of an oil spill at the Kaskida project Keathley Canyon area.

9.1.4 Worst-case Scenario Determination

Category	Regional OSRP approved 01/10//2025 Drilling	Kaskida Drilling	Regional OSRP approved 01/10/2025 Production	Kaskida DP Drillship Plan Production
Type of Activity	Drilling > 10 miles	Plan Drilling WCD > 10 miles	Production > 10 miles	Plan Production WCD > 10 miles
Facility Location	MC 778	KC 292 DC1-A	MC 822	KC 293
Facility Designation	Thunder Horse Well MC 778 #15	MODU KC292 DC1 Well A	Thunder Horse PDQ – MC822 #11	Kaskida FPU Semisubmersible
Distance to Nearest Shoreline	68-miles	191 miles	68-miles	190 miles
Volume Facility Storage:	0-bbls	0-bbls	0-bbls	0-bbls
Max Tanks /Vessels & Flowlines	50,000-bbls	0-bbls	50,000-bbls	1,529-bbls
Lease Term pipelines	13,000-bbls	0-bbls	13,000-bbls	1,571--bbls
Daily Production Volume	0-bbls	0-bbls	55,000-bbls	80,000-bbls
Volume Uncontrolled Blowout (Day 1)	360,000-bbls	45,000-bbls	0-bbls	0-bbls
Total Volume	423,000-bbls	45,000-bbls	118,000-bbls	83,100-bbls
Type of Oil(s) – (Crude Oil, Condensate, Diesel)	Crude	Crude	Crude	Crude
API Gravity(s)	32	24.4	33	24.4

bp has determined that the worst-case scenario from the activities proposed in this plan does not supersede the worst-case scenario in bp's GoM Regional OSRP filed by BP America, Inc. (Operator 21372), under cover letter dated October 7, 2022 on behalf of several companies listed in the plan including BP Exploration & Production Inc. (Operator No. 02481). The OSRP was confirmed in compliance and approved by BSEE on January 10, 2025. Pursuant to NTL No. 2008-G04, bp makes the following statement:

Since BP Exploration & Production Inc. has the capability to respond to the worst case spill scenario included in its regional Oil Spill Response Plan approved on January 10, 2025, and since the worst case scenario determined for this DOCD does not replace the worst-case scenario in our regional or sub-regional OSRP, bp certifies that it 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 this DOCD.

Wellbore data, geologic data, reservoir data, and fluid data used in modeling and developing the WCD determination for KC 292 DC1 Well A, are provided in **Appendix F** of the "Proprietary Information" copies of this DOCD.

9.2 Oil Spill Response Discussion

A detailed discussion of a response to an oil spill in the Kaskida Field in the Keathley Canyon Blocks is included in **Appendix G.** This Appendix addresses topics such as resource identification, release modeling, response technologies, and source containment / control.

9.3 Modeling Report

No report is required for this DOCD.

Environmental Monitoring and Mitigation Measures

10.1 Monitoring Systems

In addition to rig control engineered systems, operational personnel have been instructed to check for pollution frequently during their tour of duty and, if pollution is spotted, to identify and shut-off the source and make immediate notifications as per instructions provided in Section 8 of bp's certified OSRP. In accordance with the measures described in Appendices A, B, C and J of the NMFS 2020 Biological Opinion, as amended on April 26, 2021 [Biological Opinion on the Federally Regulated Oil and Gas Program Activities in the Gulf of Mexico. Office of Protected Resources, National Marine Fisheries Service, National Oceanic and Atmospheric Administration, U.S. Department of Commerce (March 13, 2020, amended April 26, 2021)], a person onboard the vessel(s) will visually monitor the moonpool(s) using a remote camera system. Logs will be kept for each shift documenting the observed presence/absence of marine animals in the moonpool(s). If a protected species is observed in the moonpool(s), required reporting to the appropriate agencies will be made and bp will comply with ensuing guidance.

Also, in accordance with the provisions of Title 30 CFR § 250.713(g) and NTL 2018-G01 "Ocean Current Monitoring" dated August 7, 2018, the MODU will be equipped with an Acoustic Doppler Current Profile (ADCP) current monitoring system onboard to allow continuous monitoring and gathering of ocean current data on a real-time basis from 30 - 1000 meters.

10.2 Incidental Takes

Mitigation measures described in Appendices A, B, C and J of the NMFS 2020 Biological Opinion, as amended in 2021, will be implemented to the extent they are applicable to the activities outlined in this plan. Monitoring activities are conducted by personnel on vessels to prevent accidental loss of materials overboard, and to report sightings of injured/dead protected species. Reporting of dead/injured protected species is addressed in Annex 2 of BP's "Incident Notification and Investigation Procedure - Attachment 1". Additionally, to mitigate against incidental takes, activities will be conducted in adherence to 2020 revisions of BSEE NTL 2015-G03 "Marine Trash and Debris Awareness Training and Elimination"; BOEM NTL 2016-G01 "Vessel Strike Avoidance and Injured/Dead Protected Species Reporting" and BOEM NTL 2016-G02 "Implementation of Seismic Survey Mitigation Measures and Protected Species Observer Program", as necessary. As required by BSEE NTL 2015-G03, bp submits an annual certification letter for its Marine Debris Awareness Training Process. The marine debris awareness training is required annually by the BSEE and is identified by "bp's Gulf of America (GoA) Environmental Training Matrix" and "bp's GoA Health, Safety, and Environmental (HSE) Training Needs Assessment", both of which are located on bp's GoA HSE website.

Further mitigation measures can be found throughout the supporting EIA found in **Appendix I.**

10.3 Flower Garden Banks National Marine Sanctuary

All proposed activities will occur outside of the Protective Zones of the Flower Garden Banks National Marine Sanctuary boundaries.

Lease Stipulations

Oil and gas exploration activities on the OCS are sometimes subject to mitigations in the form of lease stipulations.

11.1 Lease Stipulation Information

Lease Stipulation for Protected Species

Mitigation measures described in Appendices A, B, C and J of the NMFS 2020 Biological Opinion, as amended in 2021, will be implemented to the extent they are applicable to the activities outlined in this plan. Additionally, all activities will be conducted in adherence to 2020 revisions of NTL 2015-G03 "Marine Trash and Debris Awareness Training and Elimination"; BOEM NTL 2016-G01 "Vessel Strike Avoidance and Injured/Dead Protected Species Reporting" and BOEM NTL 2016-G02 "Implementation of Seismic Survey Mitigation Measures and Protected Species Observer Program", as necessary. Mitigation to prevent takes varies based on the activity underway and it can include worker training on waste management and trash and debris containment procedures to avoid accidental loss overboard and its potential impact on protected species, and training on reporting of dead/injured protected species addressed in bp's Incident Notification and Investigation Procedure.

Related Facilities and Operations Information

12.1 Related OCS Facilities and Operations

bp chose to conform to the requirements of the American Bureau of Shipping (ABS) Class Floating Offshore Installation (FOI) for the Kaskida project Kaskida Floating Production Unit (FPU). The decision to "Class" the facility ensures conformance with statutory requirements and due diligence will be exercised during the service life of the facility. bp executed a contract with ABS which provided the required services through its design, fabrication, and installation activities for assurance that the facility complied with world-recognized and respected Standards. All marine systems are classified by ABS as required for FOI Class. Marine systems are those which are required to conduct marine operations and include ballast, vents, sounds, a center well and all equipment required to operate and support these systems in or on the hull. This is a manned platform which will process produced hydrocarbons from six (6) currently planned wet tree producers from two (2) drill centers.

The subject wells will be equipped with subsea trees and will flow through subsea manifolds, connected via proposed flowlines with associated umbilicals and jumpers to bp's Kaskida semi-submersible floating platform in Keathley Canyon 293.

bp will apply for a Right-of-Use and Easement application for the expired lease on Keathley Canyon Block 293 for the installed Kaskida semi-submersible FPU and for portions of the platform anchorage system.

bp has contracted Enbridge Offshore Facilities, LLC to build, own and operate the Gas Export Pipeline (GEP) and the Oil Export Pipeline (OEP) from the Kaskida FPU in KC 293. The GEP will tie into existing Magnolia Gas Gathering system. The OEP will tie into a new Oil system from Shell's Boxer platform in GC 19 facility to onshore, called the Rome pipeline.

The proposed operations are not located within the Protective Zones of the State of Florida, Flower Garden Banks National Marine Sanctuary boundaries.

12.2 Transportation Systems

Kaskida FPU production will be transported by two DOT Right-of-Way pipelines to shore. The 24/26-in bi-directional ROW Oil Export pipeline will transport to a new riser on Shell Boxer fixed platform, GC 19, in Green Canyon, OCS-G 37258, and continue through a new pipeline, Rome, to shore in Fourchon, LA. The 12-in bi-directional ROW Gas Export pipeline will transport to a new PLET in Garden Banks 695 and then continue through the existing Magnolia Gas pipeline and then into Garden Backs Pipeline system, ROW G25309, Segment No. 14351.

12.3 Produced Liquid Hydrocarbons Transportation Vessels

Transport Method	Vessel Capacity	Average Volume to be Loaded (per transfer)	No. of Transfers (Yearly Average)
Shuttle Tanker	50,000-bbls	40,000-bbls	52

Support Vessels and Aircraft Information

13.1 Support Vessel and Aircraft Information Table

Type	Maximum Fuel Tank Storage Capacity	Maximum No. in Area at Any Time	Trip Frequency or Duration
Helicopter	760-gals	1	7 / week
Crew Boats	1,000-bbls	1	2 / week
Supply Boats	1,000-bbls	1	4 / week

13.2 Diesel Oil Supply Vessels

Size of Fuel Supply Vessel	Capacity of Fuel Supply Vessel	Frequency of Fuel Transfers	Route Fuel Supply Vessel will Take
240-feet to 280-feet	50,000-gallons (boat fuel) 150-K to 250-K gallons of transferable fuel (rig fuel)	Weekly / as needed	From the shorebase in Fourchon, LA, to KC 292

13.3 Solid and Liquid Wastes Transportation and Disposal

The project will utilize existing waste facilities. Wastes generated from the proposed activities will be transported and disposed of at permitted sites, as determined by bp's contracted Waste Management Company. All offshore generated wastes are classified, and if needed, characterized, and all are properly containerized, labeled, marked and shipped in either directly to the onshore disposal facility, or to the bp shorebase facility. A table providing information on solid and liquid wastes generated by the proposed activities is included in Table 2 found in **Appendix D**.

13.4 Vicinity Map

A vicinity map depicting the location of the proposed activities is included in **Appendix B**. In accordance with Appendices A, B, C, and J of the NMFS 2020 Biological Opinion, as amended in 2021, transit routes will avoid the Rice's whale core distribution area. As outlined in the table above, vessels will transit from shorebases in Louisiana to the blocks where activities will occur under this plan.

Onshore Support Facilities Information

14.1 General

The onshore support base for the proposed operations will be in Fourchon, Louisiana. Keathley Canyon Block 292 is located approximately 191 miles from the nearest Louisiana shoreline and approximately 222 miles from the onshore support base located in Fourchon, Louisiana, as indicated on the vicinity map in **Appendix B.**

The following table provides information about the onshore facility that will be used to provide supply and service support for the activities proposed in this plan.

Name	Location	Existing/New/Modified
C-port	Fourchon, LA	Existing
Heliport	Houma, LA	Existing

bp will primarily use the existing C-Port Fourchon Shorebase located in Fourchon, Lafourche Parish, Louisiana to support general vessel operations. No expansion of these physical facilities is expected to result from the proposed activities. The C-Port Fourchon facility is located approximately 222-miles from the general activity area, 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 in operation 24 hours each day. Helicopters will be based out of Houma, Louisiana.

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

14.2 Support Base Construction or Expansion

bp will utilize existing support bases for the proposed activities and will not require the construction or expansion of additional support bases.

Coastal Zone Management Act (CZMA) Information

15.1 Consistency Certification

Coastal Zone Management Act consistency certifications for the States of Louisiana, Texas and Alabama, according to 15 CFR Part 930.76(b), are included in **Appendix H**.

Environmental Impact Analysis (EIA)

16.1 Environmental Impact Analysis

Attached as **Appendix I** is an Environmental Impact Analysis (EIA) prepared for the proposed project by Continental Shelf Associates (CSA) Ocean Sciences Inc. 8502 Sw Kansas Ave, Stuart, FL 34997.

Mitigation measures described in Appendices A, B, C and J of the NMFS 2020 Biological Opinion, as amended in 2021, will be implemented to the extent they are applicable to the activities outlined in this plan. Additionally, BOEM (or its predecessor, the Minerals Management Service) has conducted extensive environmental analyses examining the possible impacts produced by oil and gas exploration and production activities, which evaluated impacts from similar activities on the areas in the Gulf of America covered by the present plan.

The EIA addresses potential impacts to environmental resources found in the deepwater Gulf of America, coastal habitats, protected areas, and onshore. Based on the activity set of the project, these included:

- Drilling rig presence, physical disturbance to the seafloor, air emissions, effluent discharges, water intake, onshore waste disposal, marine debris, support vessel/helicopter traffic, and unintended releases to the marine environment.

The EIA outlines high level mitigation measures that will be in place to reduce associated potential impacts.

Administrative Information

17.1 Exempted Information Description

In accordance with 43 CFR Part 2, Appendix E, sections (4) and (9), the following information has been determined by the BOEM Gulf of Mexico Region exempt from public disclosure:

- Geologic Objectives (BHL, TVD and MD) on Form BOEM-0137
- Production rates and life of reservoirs
- Proprietary New or Unusual Technology
- Geological and Geophysical Information (except for non-proprietary Shallow Hazard Assessment)
- Hydrogen Sulfide Correlative Well Information

This information is excluded from the "Public Information" copies of the submitted plan.

17.2 Bibliography

Any previously submitted EP, DPP, DOCD, study report, survey report, or any other material referenced in this DOCD is listed below:

Plan Control No	Lease	Block	Operator Name	Operator Number	Plan Type Code	Received Date	Final Action Code	Final Action Date
N-8245	G25792	KC292	BP Exploration & Oil Inc.	02481	EP	10/26/2004	A	12/2/2004
S-7364	G25792	KC292	BP Exploration & Oil Inc.	02481	SEP	10/29/2009	A	12/9/2009
N-8338	G19555	KC336	BP Exploration & Production Inc.	02481	EP	2/15/2005	A	3/21/2005
S-7451	G19555 G25792	KC336 KC292	BP Exploration & Production Inc.	02481	SEP	11/30/2010	A	10/21/2011

17.3 Other Reference Items

BP, September 2010. "Deepwater Horizon Containment and Response: Harnessing Capabilities and Lessons Learned."

Fugro Geoservices, Inc (FGSI), 2011, "AUV Archaeological Assessment Kaskida Prospect, Blocks 246-248, 290-292, & 335-336, Keathley Canyon Area Gulf of Mexico, FGSI Report No. 2411-1025, Houston, TX, USA.

Geoscience Earth & Marine Services, Inc (GEMS), 2024,"Integrated Shallow Hazards Assessment, Blocks 246-248, 209-292, and 335-336, Keathley Canyon Area, U. S. Gulf of Mexico", GEMS Project No. GHZ3282. Houston, Texas, USA.

17.4 Recovery Fees

Appendix K contains a copy of the receipt showing the payment required by 30 CFR Part 250.125.

Appendixes

Appendix A:	Plan Information Forms – Form BOEM-0137
Appendix B:	Vicinity Maps, Location Plats, and Bathymetry Maps
Appendix C:	Site Clearance Letters for Drill Centers, pre-lay of moorings and wet parking pipeline risers)
Appendix D:	Wastes and Discharges Tables (Projected Generated Wastes and Projected Ocean Discharges)
Appendix E:	Air Emissions Information – Form BOEM-0139
Appendix F:	PROPRIETARY COPIES ONLY - WCD Modeling Report for KC 291-A
Appendix G:	Oil Spill Response Discussion
Appendix H:	Coastal Zone Management Act (CZMA) Consistency Certifications
Appendix I:	Environmental Impact Analysis (EIA)
Appendix J:	New Technology
Appendix K:	Fee Recovery

Appendix A: Plan Information Forms – Form BOEM-0137

U.S. Department of the Interior
Bureau of Ocean Energy Management

PUBLIC INFORMATION

OMB Control Number: 1010-0151
OMB Approval Expires: 6/30/2021

OCS PLAN INFORMATION FORM

General Information

Type of OCS Plan:		Exploration Plan (EP)	X	Development Operations Coordination Document (DOCD)			
Company Name: BP Exploration & Production Inc.				BOEM Operator Number: 02481			
Address: 501 Westlake Park Blvd.				Contact Person: Betsy Cleland			
Houston, TX 77079				Phone Number: 281-773-9088			
				E-Mail Address: betsy.cleland@bp.com			
If a service fee is required under 30 CFR 550.125(a), provide the		Amount paid	$55,650	Receipt No.	27LFQKNM, 27LF6LVA, 27LEBOCB		

Project and Worst-Case Discharge (WCD) Information

Leases: OCS-G 25792			Area: Keathley Canyon			Blocks: 292		Project Name (If Applicable): Kaskida			
Objective(s)	X	Oil		Gas		Sulphur		Salt	Onshore Support Base(s): Fourchon, LA		
Platform / Well Name: Kaskida			Total Volume of WCD: 4 mmbo					API Gravity: 24.4			
Distance to Closest Land (Miles): 190			Volume from uncontrolled blowout: 45,000 bopd								

Have you previously provided information to verify the calculations and assumptions for your WCD?		Yes	X	No
If so, provide the Control Number of the EP or DOCD with which this information was provided				
Do you propose to use new or unusual technology to conduct your activities?	X	Yes		No
Do you propose to use a vessel with anchors to install or modify a structure?		Yes	X	No
Do you propose any facility that will serve as a host facility for deepwater subsea development?	X	Yes		No

Description of Proposed Activities and Tentative Schedule (Mark all that apply)

Proposed Activity	Start Date	End Date	No. of Days
Drill, Complete and Produce Drill Center 1 (DC1) Wells A through E	07/01/2026	06/30/2030	1460
Drill, Complete and Produce Drill Center 2 (DC2) Wells A through E	07/01/2026	06/30/2030	1460
Install piles, pipelines, manifolds, flying leads, jumpers and associated appurtenances	07/15/2027	10/31/2027	108
Install Semi-Submersible Production Facility	07/01/2028	07/30/2028	30
Install risers, umbilicals, pipelines, manifolds, flying leads, jumpers and associated appurtenances	07/30/2028	09/13/2028	45

Description of Drilling Rig

	Jackup	X	Drillship		Caisson		Tension leg platform
	Gorilla Jackup		Platform rig		Fixed platform		Compliant tower
	Semisubmersible		Submersible		Spar		Guyed tower
	DP Semisubmersible		Other (Attach description)	X	Floating production system		Other (Attach description)
Drilling Rig Name (If known): Invictus, Atlas or available Drillship							

Description of Lease Term Pipelines

From (Facility/Area/Block)	To (Facility/Area/Block)	Diameter (Inches)	Length (Feet)
P1 KC 292 DC1 Manifold	KC 293 FPU	9.625"	14,467
P2 KC 292 DC1 Manifold	KC 293 FPU	9.625"	14,767

P3 KC 292 DC2 Manifold	KC 292 DC1 Manifold	9.625"	5,092
P4 KC 292 DC2 Manifold	KC 292 DC1 Manifold	9.625"	5,096
EHOD-U KC 292 DC1 Manifold	KC 293 FPU	6.65"	18,505
SP-U KC 292 DC1 Manifold	KC 293 FPU	6.28"	17,061
EHOI-U KC 292 DC2 Manifold	KC 292 DC1 Manifold	6.65"	5,070
KC 292 DC1-A	KC 292 DC1 Manifold	8.625"	~85
KC 292 DC1-B	KC 292 DC1 Manifold	8.625"	~85
KC 292 DC1-C	KC 292 DC1 Manifold	8.625"	~85
KC 292 DC2-A	KC 292 DC2 Manifold	8.625"	~85
KC 292 DC2-B	KC 292 DC2 Manifold	8.625"	~85
KC 292 DC2-C	KC 292 DC2 Manifold	8.625"	~85

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): Kaskida FPU					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day):	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	293		
Blockline Departures (in feet)	N/S Departure: 6,359.18' FSL	N/S Departure:	N/S Departure F__L N/S Departure F__L N/S Departure F__L
	E/W Departure: 3,574.40' FWL	E/W Departure:	E/W Departure F__L E/W Departure F__L E/W Departure F__L
Lambert X-Y coordinates	X: 1,793,494.4'	X:	X: X: X:
	Y: 9,684,609.18'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 41' 19.261" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 31' 51.865" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 5,561'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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
NW-1	KC	292	X: 1786885.00	Y: 9690395.00	0*
NW-2	KC	292	X: 1787293.30	Y: 9690833.21	0*
NW-3	KC	292	X: 1787850.49	Y: 9691344.28	0*
NE-1	KC	293	X: 1799100.70	Y: 9691290.67	0*
NE-2	KC	293	X: 1799653.15	Y: 9690783.72	0*
NE-3	KC	293	X: 1800065.00	Y: 9690347.00	0*
SE-1	KC	293	X: 1800371.00	Y: 9678376.50	0*
SE-2	KC	293	X: 1799437.70	Y: 9678376.50	0*
SE-3	KC	337	X: 1799042.42	Y: 9677801.95	0*
SW-1	KC	336	X: 1788297.00	Y: 9677514.00	0*

SW-2	KC	336	X: 1787815.53	Y: 9677884.38	0*
SW-3	KC	292	X: 1787255.46	Y: 9678398.10	0*

- Chain penetrates seafloor about 100 ft from the center of suction pile, however no chain actually rests on seafloor

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): DC1					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,777.00' FSL	N/S Departure:	N/S Departure F__L N/S Departure F__L N/S Departure F__L
	E/W Departure: 6,834.00' FEL	E/W Departure:	E/W Departure F__L E/W Departure F__L E/W Departure F__L
Lambert X-Y coordinates	X: 1,783,086.00'	X:	X: X: X:
	Y: 9,681,017.00'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 44.037" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 33' 46.614" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,082'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC1 "A"					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,858.78' FSL	N/S Departure:	N/S Departure F__L N/S Departure F__L N/S Departure F__L
	E/W Departure: 6,773.22' FEL	E/W Departure:	E/W Departure F__L E/W Departure F__L E/W Departure F__L
Lambert X-Y coordinates	X: 1,783,146.78'	X:	X: X: X:
	Y: 9,681,098.78'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 44.846" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 33' 45.941" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,084'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC1 "B"					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,737.05' FSL	N/S Departure:	N/S Departure F __ L N/S Departure F __ L N/S Departure F __ L
	E/W Departure: 6,739.71' FEL	E/W Departure:	E/W Departure F __ L E/W Departure F __ L E/W Departure F __ L
Lambert X-Y coordinates	X: 1,783,180.29'	X:	X: X: X:
	Y: 9,680,977.05'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 43.638" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 33' 45.576" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,078'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC1 "C"					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,726.47' FSL	N/S Departure:	N/S Departure F__L N/S Departure F__L N/S Departure F__L
	E/W Departure: 6,923.19' FEL	E/W Departure:	E/W Departure F__L E/W Departure F__L E/W Departure F__L
Lambert X-Y coordinates	X: 1,782,996.81'	X:	X: X: X:
	Y: 9,680,966.47'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 43.540" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 33' 47.600" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,081'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC1 "D"					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,799.82' FSL	N/S Departure:	N/S Departure F __ L N/S Departure F __ L N/S Departure F __ L
	E/W Departure: 6,734.29' FEL	E/W Departure:	E/W Departure F __ L E/W Departure F __ L E/W Departure F __ L
Lambert X-Y coordinates	X: 1,783,185.71'	X:	X: X: X:
	Y: 9,681,039.82'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 44.260" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 33' 45.514" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,080'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC1 "E"					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,788.21' FSL	N/S Departure:	N/S Departure F__L N/S Departure F__L N/S Departure F__L
	E/W Departure: 6,935.73' FEL	E/W Departure:	E/W Departure F__L E/W Departure F__L E/W Departure F__L
Lambert X-Y coordinates	X: 1,782,984.27'	X:	X: X: X:
	Y: 9,681,028.21'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 44.452" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 33' 47.735" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,085'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC2					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day):	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292	292	
Blockline Departures (in feet)	N/S Departure: 2,910.00' FSL	N/S Departure:	N/S Departure F__L N/S Departure F__L N/S Departure F__L
	E/W Departure: 3,920.00' FWL	E/W Departure:	E/W Departure F__L E/W Departure F__L E/W Departure F__L
Lambert X-Y coordinates	X: 1,778,000.000'	X:	X: X: X:
	Y: 9,681,150.00'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 45.525" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 34' 42.697" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,025'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC2 "A"					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,991.78' FSL	N/S Departure:	N/S Departure F__L N/S Departure F__L N/S Departure F__L
	E/W Departure: 3,980.78' FWL	E/W Departure:	E/W Departure F__L E/W Departure F__L E/W Departure F__L
Lambert X-Y coordinates	X: 1,778,060.78'	X:	X: X: X:
	Y: 9,681,231.78'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 46.333" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 34' 42.024" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,028'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC2 "B"					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,870.06' FSL	N/S Departure:	N/S Departure F__ L N/S Departure F__ L N/S Departure F__ L
	E/W Departure: 4,014.29' FWL	E/W Departure:	E/W Departure F__ L E/W Departure F__ L E/W Departure F__ L
Lambert X-Y coordinates	X: 1,778,094.29'	X:	X: X: X:
	Y: 9,681,110.06'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 45.126" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 34' 41.659" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,024'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC2 "C"					Previously reviewed under an approved EP or DOCD?		Yes	X	No	
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.					
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No	

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,859.47' FSL	N/S Departure:	N/S Departure F__L N/S Departure F__L N/S Departure F__L
	E/W Departure: 3,830.80' FWL	E/W Departure:	E/W Departure F__L E/W Departure F__L E/W Departure F__L
Lambert X-Y coordinates	X: 1,777,910.80'	X:	X: X: X:
	Y: 9,681,099.47'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 45.027" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 34' 43.683" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,023'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC2 "D"					Previously reviewed under an approved EP or DOCD?		Yes	X	No
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.				
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,932.82' FSL	N/S Departure:	N/S Departure F__L N/S Departure F__L N/S Departure F__L
	E/W Departure: 4,019.79' FWL	E/W Departure:	E/W Departure F__L E/W Departure F__L E/W Departure F__L
Lambert X-Y coordinates	X: 1,778,099.79'	X:	X: X: X:
	Y: 9,681,172.82'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 45.747" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 34' 41.596" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,026'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

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): DC2 "E"					Previously reviewed under an approved EP or DOCD?		Yes	X	No
Is this an existing well or structure?		Yes	X	No	If this is an existing well or structure, list the Complex ID or API No.				
Do you plan to use a subsea BOP or a surface BOP on a floating facility to conduct your proposed activities?						X	Yes		No

WCD Info	For wells, volume of uncontrolled blowout (Bbls/Day): 45,000	For structures, volume of all storage and pipelines (Bbls):	API Gravity of fluid	24.4

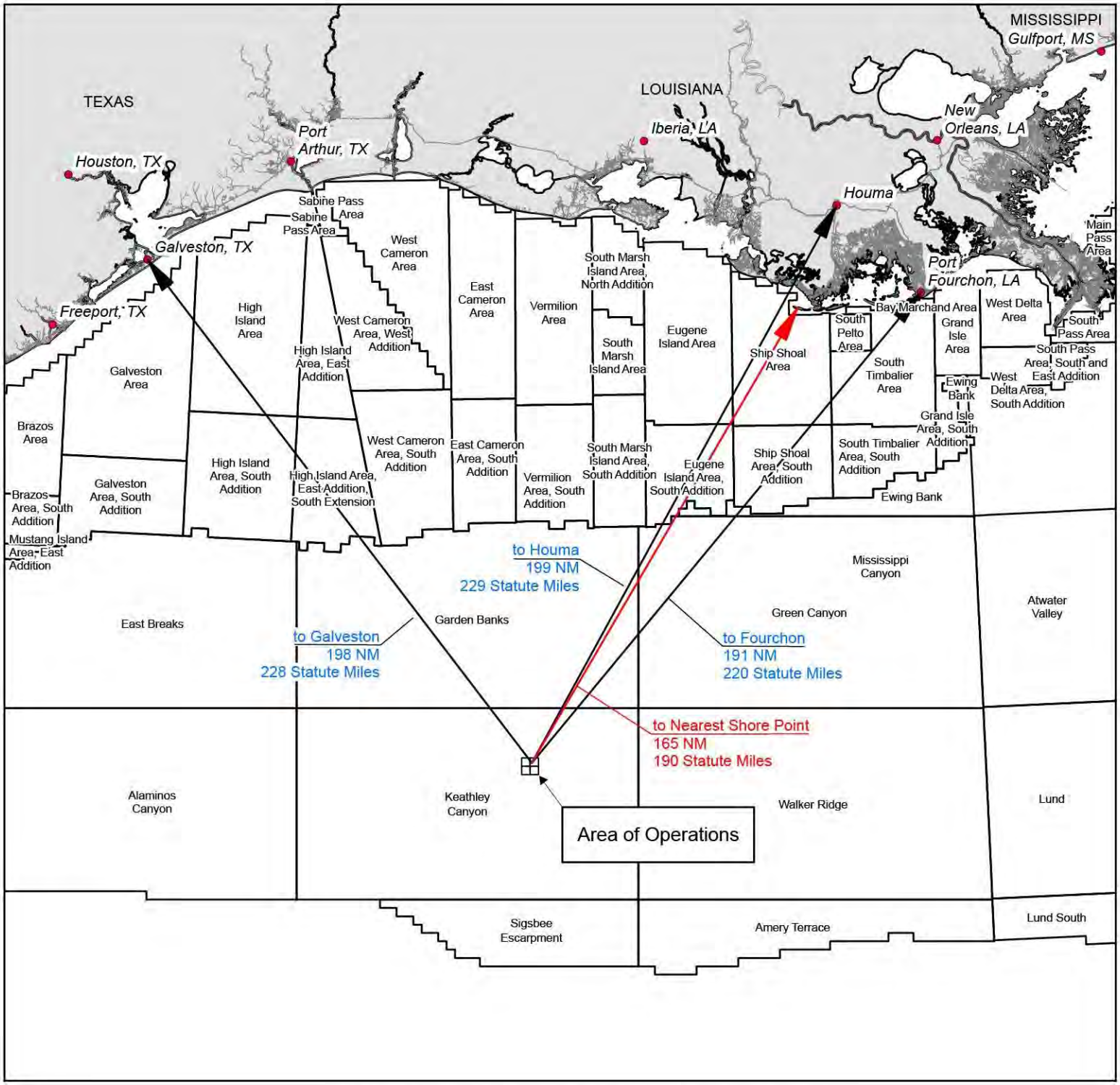
	Surface Location	**Bottom-Hole Location (For Wells)**	**Completion (For multiple completions, enter separate lines)**
Lease No.	OCS-G 25792		OCS OCS
Area Name	Keathley Canyon		
Block No.	292		
Blockline Departures (in feet)	N/S Departure: 2,921.21' FSL	N/S Departure:	N/S Departure F__L N/S Departure F__L N/S Departure F__L
	E/W Departure: 3,818.26' FWL	E/W Departure:	E/W Departure F__L E/W Departure F__L E/W Departure F__L
Lambert X-Y coordinates	X: 1,777,898.26'	X:	X: X: X:
	Y: 9,681,161.21'	Y:	Y: Y: Y:
Latitude/ Longitude	Latitude: 26° 40' 45.639" N	Latitude:	Latitude Latitude Latitude
	Longitude: 92° 34' 43.819" W	Longitude:	Longitude Longitude Longitude

Water Depth (Feet): 6,025'	MD (Feet):	TVD (Feet):	MD (Feet): MD (Feet): MD (Feet):	TVD (Feet): TVD (Feet): TVD (Feet):
Anchor Radius (if applicable) in feet:				

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:	

Appendix B: Vicinity Maps, Location Plats, and Bathymetry Maps



Note: FPU Center used for distance calculations to the shoreline. The shoreline used is the NOAA 1:24K Continuously Updated Shoreline Product (CUSP).

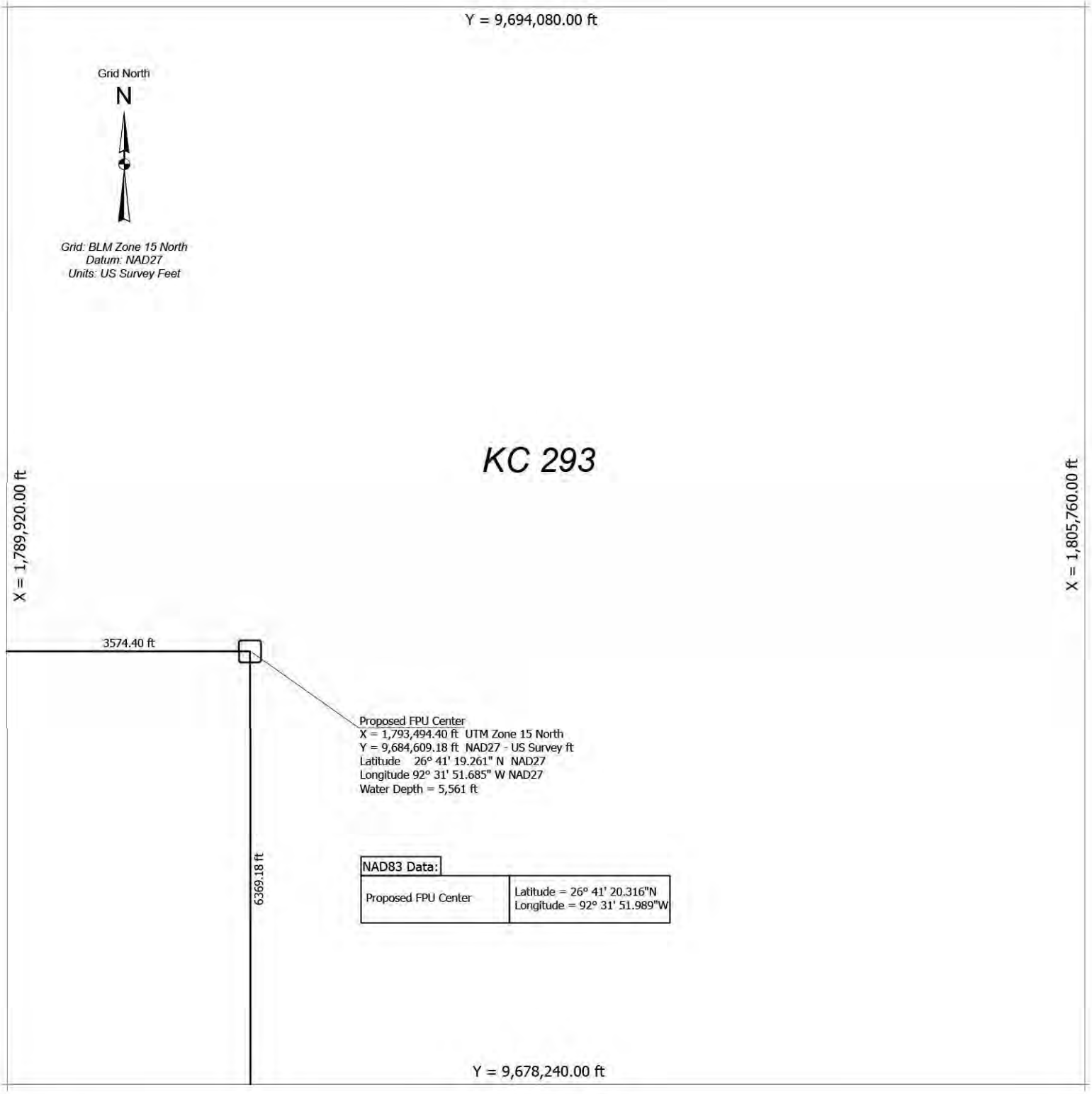
Grid North

N
W E
S

Grid: BLM Zone 15 North
Datum: NAD27
Units: US Survey Feet

"Vicinity Chart"

bp	BP EXPLORATION AND PRODUCTION	Scale 1" = 50 miles
	Proposed FPU Center Surface Location	Date: 10/10/2024
	Keathley Canyon Area (OPD# NG15-05) Block 292, 293, 336, 337 *Offshore Federal*	
	Plat prepared by: Ian Dootson (BP Solutions)	ID



Notes:
1) All spatial data based on BLM Zone 15 North, NAD27, US Survey Feet, unless otherwise noted;
2) All geodetic transformations based on NADCON version 2.0 or better software;

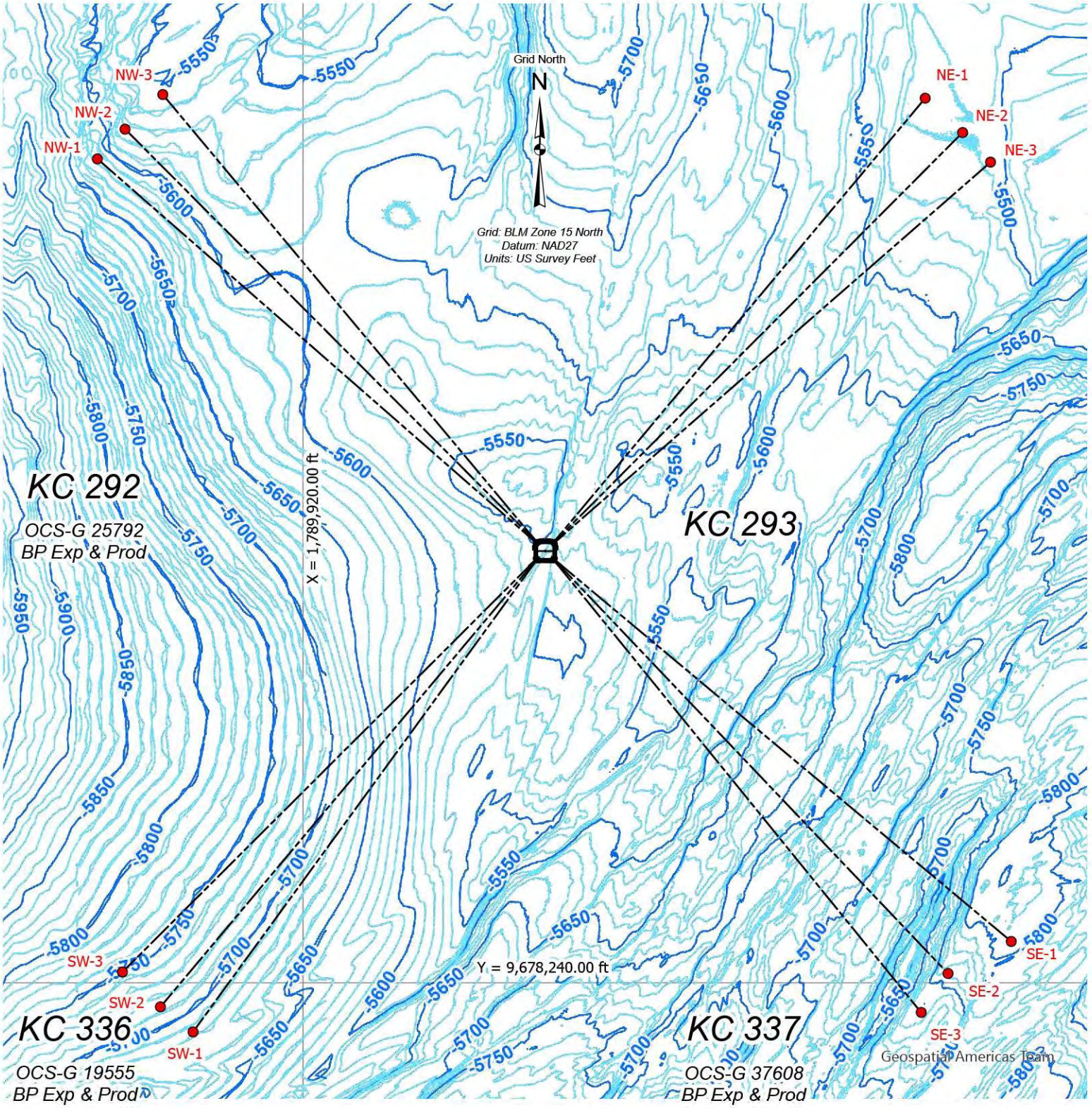
bp	BP EXPLORATION AND PRODUCTION	Scale 1" = 2000 ft
	Proposed FPU Center Surface Location	Date: 10/10/2024
	Keathley Canyon Area (OPD# NG15-05) Block 293 — *Offshore Federal*	Sheet 1 of 3
	Plat prepared by: Ian Dootson (BP Solutions)	ID

Pile	BLM Zone 15 North NAD27 - US Survey Feet		NAD27		NAD83	
	Easting	Northing	Latitude	Longitude	Latitude	Longitude
NW-1	1786885.00	9690395.00	26 42 16.819N	92 33 04.355W	26 42 17.873N	92 33 04.663W
NW-2	1787293.30	9690833.21	26 42 21.146N	92 32 59.834W	26 42 22.200N	92 33 00.142W
NW-3	1787850.49	9691344.28	26 42 26.190N	92 32 53.668W	26 42 27.244N	92 32 53.976W
NE-1	1799100.70	9691290.67	26 42 25.249N	92 30 49.574W	26 42 26.302N	92 30 49.878W
NE-2	1799653.15	9690783.72	26 42 20.205N	92 30 43.501W	26 42 21.258N	92 30 43.805W
NE-3	1800065.00	9690347.00	26 42 15.863N	92 30 38.977W	26 42 16.916N	92 30 39.281W
SE-1	1800371.00	9678849.00	26 40 21.936N	92 30 36.089W	26 40 22.992N	92 30 36.389W
SE-2	1799437.70	9678376.50	26 40 17.290N	92 30 46.400W	26 40 18.346N	92 30 46.700W
SE-3	1799042.42	9677801.95	26 40 11.613N	92 30 50.783W	26 40 12.669N	92 30 51.083W
SW-1	1788297.00	9677514.00	26 40 09.151N	92 32 49.285W	26 40 10.208N	92 32 49.588W
SW-2	1787815.53	9677884.38	26 40 12.838N	92 32 54.579W	26 40 13.895N	92 32 54.883W
SW-3	1787255.46	9678398.10	26 40 17.947N	92 33 00.735W	26 40 19.004N	92 33 01.039W

Pile	Depth	Block	Block Ties (feet)			
NW-1	5613	KC292	3035.00	FEL	3685.00	FNL
NW-2	5573	KC292	2626.70	FEL	3246.79	FNL
NW-3	5553	KC292	2069.51	FEL	2735.72	FNL
NE-1	5510	KC293	6659.30	FEL	2789.33	FNL
NE-2	5510	KC293	6106.85	FEL	3296.28	FNL
NE-3	5507	KC293	5695.00	FEL	3733.00	FNL
SE-1	5803	KC293	5389.00	FEL	609.00	FSL
SE-2	5760	KC293	6322.30	FEL	136.50	FSL
SE-3	5737	KC337	6717.58	FEL	438.05	FNL
SW-1	5683	KC336	1623.00	FEL	726.00	FNL
SW-2	5713	KC336	2104.47	FEL	355.62	FNL
SW-3	5746	KC292	2664.54	FEL	158.10	FSL

Notes:
1) All spatial data based on BLM Zone 15 North, NAD27, US Survey Feet, unless otherwise noted;
2) All geodetic transformations based on NADCON version 2.0 or better software;

bp	BP EXPLORATION AND PRODUCTION	Scale 1" = 2000 ft
	Proposed FPU Mooring Pile Locations	Date: 10/10/2024
	Keathley Canyon Area (OPD# NG15-05) Block 293 *Offshore Federal*	Sheet 2 of 3
	Plat prepared by: Ian Dootson (BP Solutions)	ID



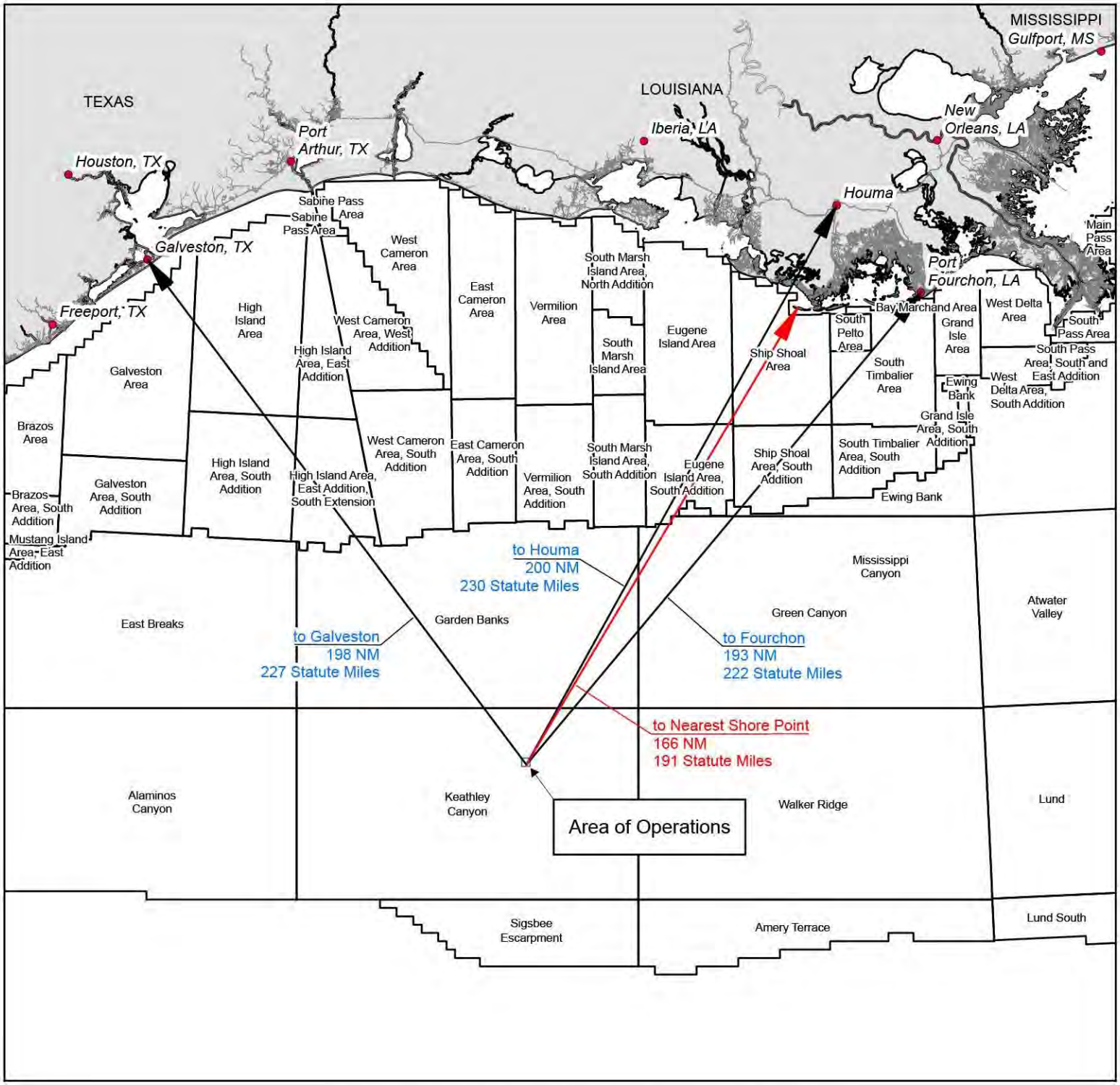
Notes:
1) All spatial data based on BLM Zone 15 North, NAD27, US Survey Feet, unless otherwise noted;
2) All geodetic transformations based on NADCON version 2.0 or better software;
3) Bathymetry derived from 2008 and 2023 AUV Surveys

Legend

- Mooring Piles

"Bathymetry"

bp	BP EXPLORATION AND PRODUCTION	Scale 1" = 2000 ft
	Proposed FPU Mooring Pile Locations	Date: 10/10/2024
	Keathley Canyon Area (OPD# NG15-05) Block 292, 293, 336, 337 *Offshore Federal*	Sheet 3 of 3
	Plat prepared by: Ian Dootson (BP Solutions)	ID



Note: DC1 Well "A" in KC292 used for distance calculations to the shoreline. The shoreline used is the NOAA 1:24K Continuously Updated Shoreline Product (CUSP).

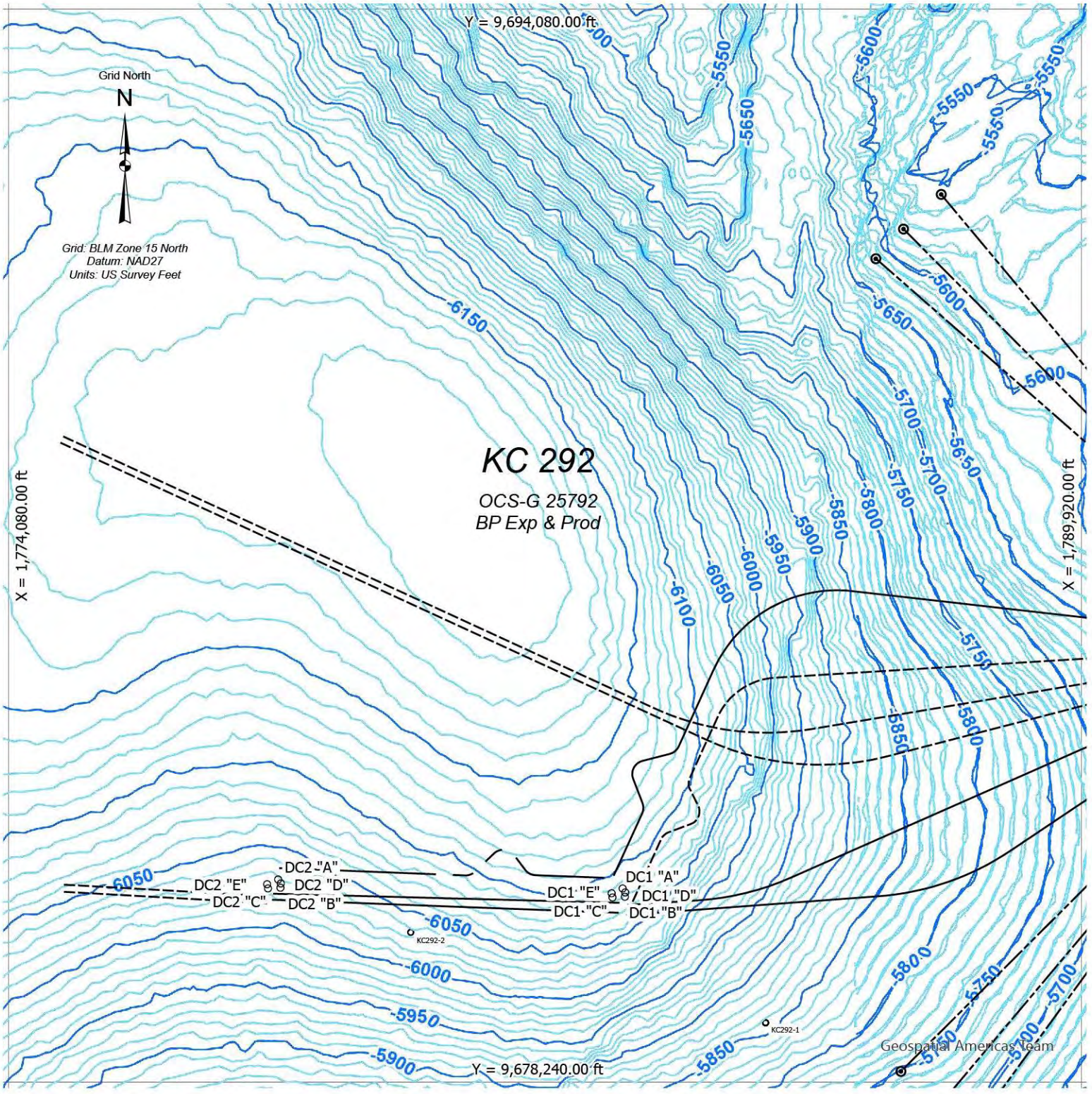
Grid North

N
W E
S

Grid: BLM Zone 15 North
Datum: NAD27
Units: US Survey Feet

"Vicinity Chart"

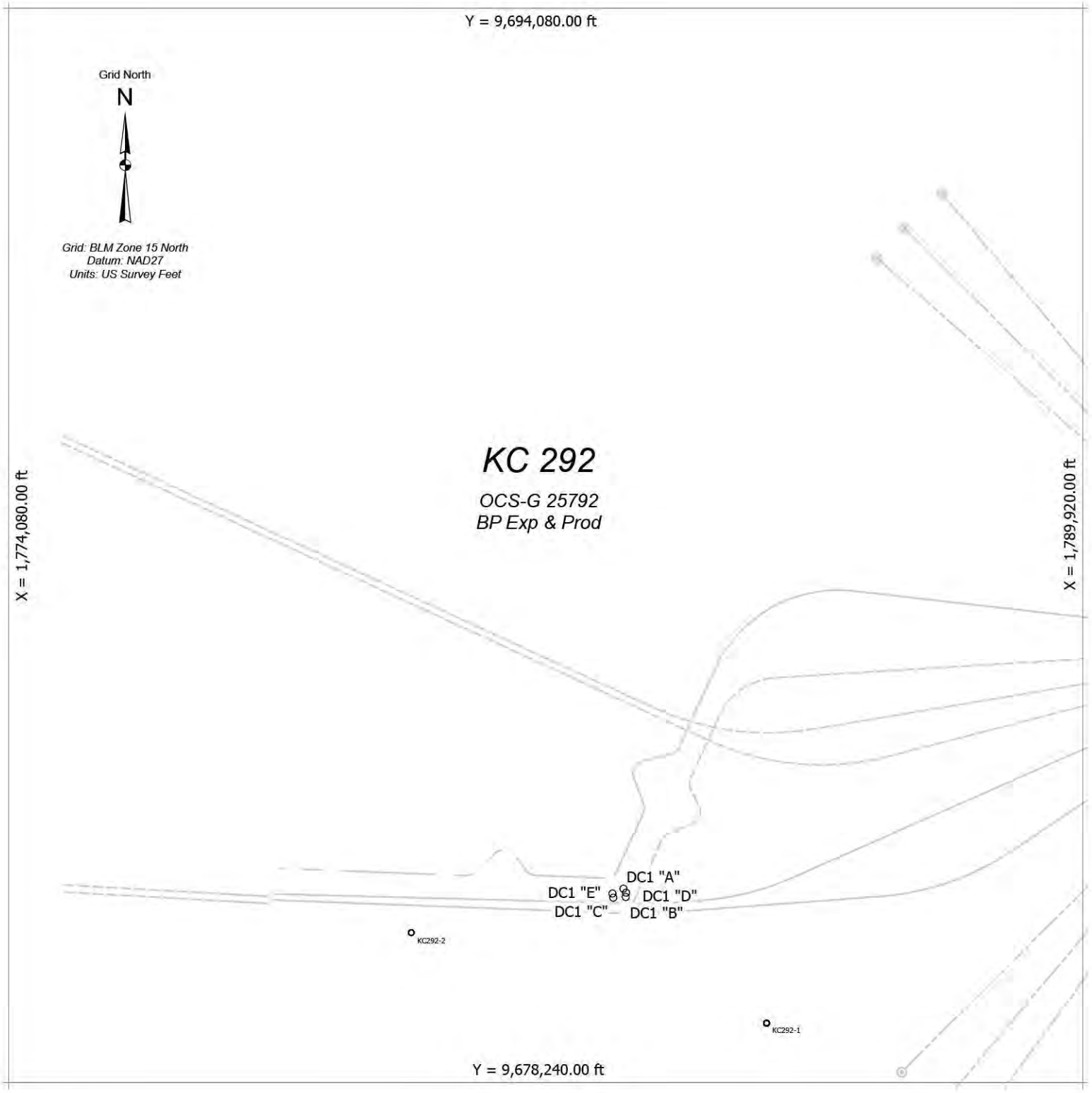
bp	BP EXPLORATION AND PRODUCTION	Scale 1" = 50 miles
	Proposed Well Locations OCS-G25792 KC 292 DC1/DC2 Wells "A" to "E"	Date: 11/27/2024
	Keathley Canyon Area (OPD# NG15-05) Block 292 — *Offshore Federal*	
	Plat prepared by: Ian Dootson (BP Solutions)	ID



Notes:
1) All spatial data based on BLM Zone 15 North, NAD27, US Survey Feet, unless otherwise noted;
2) All geodetic transformations based on NADCON version 2.0 or better software;
3) All well SHL and BHL data based upon BSEE data as of August 2024 and internal BP sources;

"Bathymetry"

bp	BP EXPLORATION AND PRODUCTION	Scale 1" = 2000 ft
	Proposed Well Locations OCS-G25792 KC 292 DC1/DC2 Wells "A" to "E"	Date: 11/27/2024
	Keathley Canyon Area (OPD# NG15-05) Block 292 *Offshore Federal*	
	Plat prepared by: Ian Dootson (BP Solutions)	ID



Notes:
1) All spatial data based on BLM Zone 15 North, NAD27, US Survey Feet, unless otherwise noted;
2) All geodetic transformations based on NADCON version 2.0 or better software;
3) All well SHL and BHL data based upon BSEE data as of August 2024 and internal BP sources;

"Public"

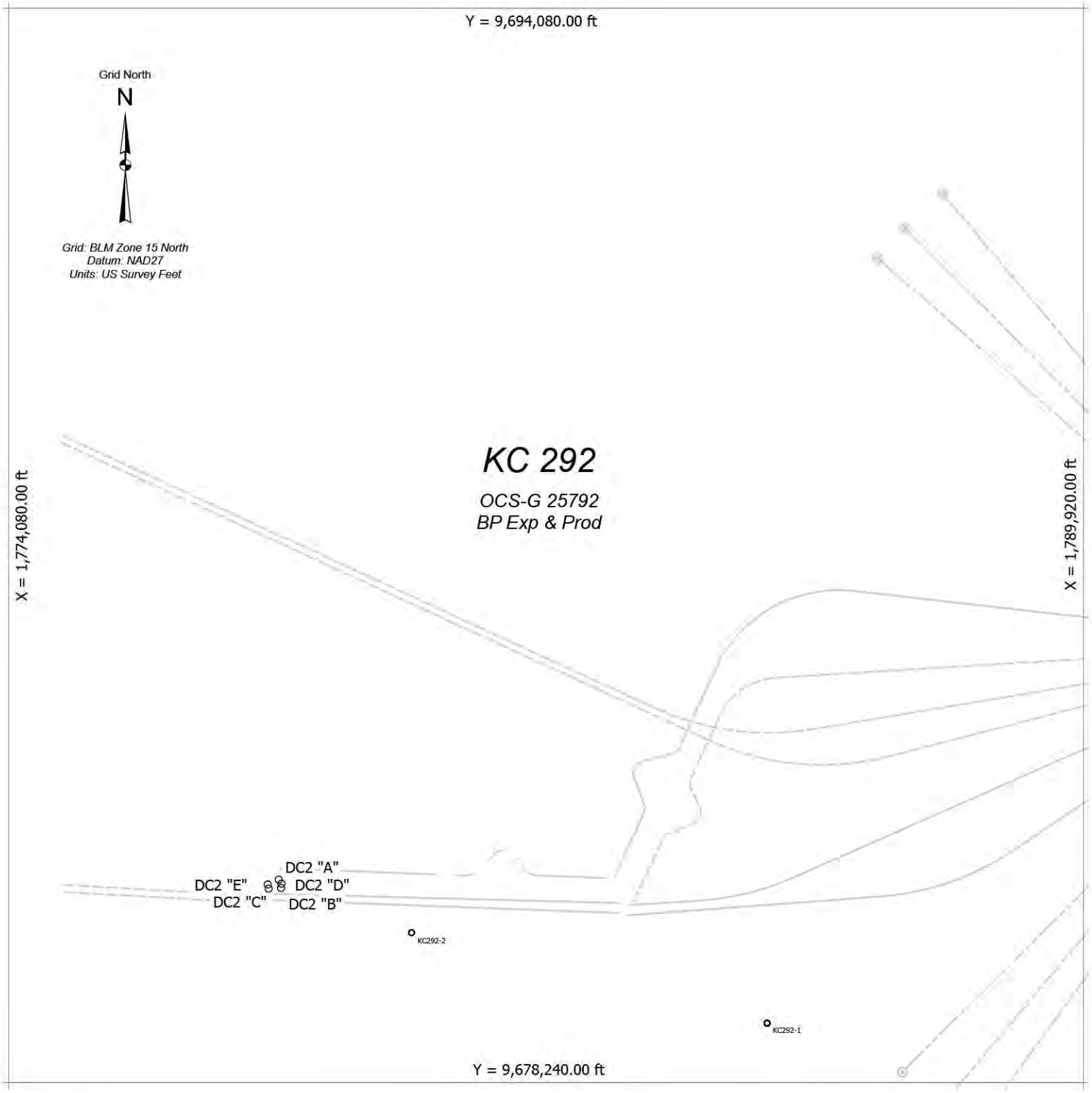
bp	BP EXPLORATION AND PRODUCTION	Scale 1" = 2000 ft
	DC1 Proposed Well Locations OCS-G25792 KC 292 Wells "A", "B", "C", "D", "E"	Date: 11/27/2024
	Keathley Canyon Area (OPD# NG15-05) Block 292 — *Offshore Federal*	Sheet 1 of 2
	Plat prepared by: Ian Dootson (BP Solutions)	ID

	Well	BLM Zone 15 North NAD27 - US Survey Feet		KC BLK	Block Ties		NAD27		NAD83		Depth	
		Easting	Northing		FEL	FSL	Latitude	Longitude	Latitude	Longitude		
SHL	DC1 "A"	1,783,146.78	9,681,098.78	292	6,773.22	2,858.78	26°40'44.846"N	92°33'45.941"W	26 40 45.902N	92 33 46.247W	6,084	Depth MSL
	DC1 "B"	1,783,180.29	9,680,977.05	292	6,739.71	2,737.05	26°40'43.638"N	92°33'45.576"W	26 40 44.695N	92 33 45.882W	6,078	
	DC1 "C"	1,782,996.81	9,680,966.47	292	6,923.19	2,726.47	26°40'43.540"N	92°33'47.600"W	26 40 44.596N	92 33 47.906W	6,081	
	DC1 "D"	1,783,185.71	9,681,039.82	292	6,734.29	2,799.82	26°40'44.260"N	92°33'45.514"W	26 40 45.317N	92 33 45.820W	6,080	
	DC1 "E"	1,782,984.27	9,681,028.21	292	6,935.73	2,788.21	26°40'44.152"N	92°33'47.735"W	26 40 45.209N	92 33 48.042W	6,085	

Notes:
1) All spatial data based on BLM Zone 15 North, NAD27, US Survey Feet, unless otherwise noted;
2) All geodetic transformations based on NADCON version 2.0 or better software;
3) All well SHL and BHL data based upon BSEE data as of August 2024 and internal BP sources;

"Public"

bp	BP EXPLORATION AND PRODUCTION	Scale 1" = 2000 ft
	DC1 Proposed Well Locations OCS-G25792 KC 292 Wells "A", "B", "C", "D", "E"	Date: 11/27/2024
	Keathley Canyon Area (OPD# NG15-05) Block 292 *Offshore Federal*	Sheet 2 of 2
	Plat prepared by: Ian Dootson (BP Solutions)	ID



Notes:
1) All spatial data based on BLM Zone 15 North, NAD27, US Survey Feet, unless otherwise noted;
2) All geodetic transformations based on NADCON version 2.0 or better software;
3) All well SHL and BHL data based upon BSEE data as of August 2024 and internal BP sources;

"Public"

bp	BP EXPLORATION AND PRODUCTION	Scale 1" = 2000 ft
	DC2 Proposed Well Locations OCS-G25792 KC 292 Wells "A", "B", "C", "D", "E"	Date: 11/27/2024
	Green Canyon Area (OPD# NG15-05) Block 292 — *Offshore Federal*	Sheet 1 of 2
	Plat prepared by: Ian Dootson (BP Solutions)	ID

	Well	BLM Zone 15 North NAD27 - US Survey Feet		KC BLK	Block Ties		NAD27		NAD83		Depth	
		Easting	Northing		FWL	FSL	Latitude	Longitude	Latitude	Longitude		
SHL	DC2 "A"	1,778,060.78	9,681,231.78	292	3,980.78	2,991.78	26°40'46.333"N	92°34'42.024"W	26 40 47.390N	92 34 42.332W	6,028	Depth MSL
	DC2 "B"	1,778,094.29	9,681,110.06	292	4,014.29	2,870.06	26°40'45.126"N	92°34'41.659"W	26 40 46.183N	92 34 41.967W	6,024	
	DC2 "C"	1,777,910.80	9,681,099.47	292	3,830.80	2,859.47	26°40'45.027"N	92°34'43.683"W	26 40 46.084N	92 34 43.991W	6,023	
	DC2 "D"	1,778,099.79	9,681,172.82	292	4,019.79	2,932.82	26°40'45.747"N	92°34'41.596"W	26 40 46.804N	92 34 41.904W	6,026	
	DC2 "E"	1,777,898.26	9,681,161.21	292	3,818.26	2,921.21	26°40'45.639"N	92°34'43.819"W	26 40 46.696N	92 34 44.127W	6,025	

Notes:
1) All spatial data based on BLM Zone 15 North, NAD27, US Survey Feet, unless otherwise noted;
2) All geodetic transformations based on NADCON version 2.0 or better software;
3) All well SHL and BHL data based upon BSEE data as of August 2024 and internal BP sources;

"Public"

bp	BP EXPLORATION AND PRODUCTION	Scale 1" = 2000 ft
	DC2 Proposed Well Locations OCS-G25792 KC 292 Wells "A", "B", "C", "D", "E"	Date: 11/27/2024
	Keathley Canyon Area (OPD# NG15-05) Block 292 *Offshore Federal*	Sheet 2 of 2
	Plat prepared by: Ian Dootson (BP Solutions)	ID

Appendix C: Shallow Hazards Assessments for Wells, Mooring Pre-Lay & Wet Parking Risers (Site Clearance Letters)

SITE CLEARANCE LETTER
KASKIDA PROPOSED DRILL CENTER 1, BLOCK 292, OCS-G25792 KEATHLEY CANYON AREA

PROPOSED SURFACE LOCATION – DC1 WELL "A"	
92° 33' 45.941" W	26° 40' 44.846" N
X = 1,783,146.78 ft E	Y = 9,681,098.78 ft N
2.854 FSL	6,776 FEL
Water Depth:	6,084 ft below MSL
PROPOSED SURFACE LOCATION – DC1 WELL "B"	
92° 33' 45.576" W	26° 40' 43.638" N
X = 1,783,180.29 ft E	Y = 9,680,977.05 ft N
2,738 FSL	6,735 FEL
Water Depth:	6,078 ft below MSL
PROPOSED SURFACE LOCATION – DC1 WELL "C"	
92° 33' 47.599" W	26° 40' 43.540" N
X = 1,782,996.80 ft E	Y = 9,680,966.47 ft N
2,727 FSL	6,925 FEL
Water Depth:	6,081 ft below MSL
PROPOSED SURFACE LOCATION –DC1 ALTERNATE WELL "D"	
92° 33' 45.513" W	26° 40' 44.260" N
X = 1,783,185.71 ft E	Y = 9,681,039.82 ft N
2,782 FSL	6,740 FEL
Water Depth:	6,080 ft below MSL
PROPOSED SURFACE LOCATION –DC1 ALTERNATE WELL "E"	
92° 33' 47.735" W	26° 40' 44.152" N
X = 1,782,984.27 ft E	Y = 9,681,028.21 ft N
2,771 FSL	6,940 FEL
Water Depth:	6,086 ft below MSL

X and Y Coordinates in UTM 15N (US Survey ft)
Geodetic Datum: NAD 1927
Spheroid: Clarke 1866

KASKIDA DRILL CENTER 1 WELLS "A", "B", "C", "D", AND "E"

BLOCK 292, OCS-G25792

KEATHLEY CANYON AREA, GULF OF MEXICO, USA

Introduction. This wellsite clearance letter addresses the shallow hazards for proposed wellsites "A", "B", "C", "D", AND "E" at the Kaskida Drill Center 1 (DC1) in Block 292, Keathley Canyon, Gulf of Mexico (OCS-G25792). This letter is intended to address specific seafloor and shallow geologic conditions within 2,000 ft of the proposed wellsites from the seafloor (about 6,081ft Total Vertical Depth Sub-Sea; TVDSS) to about 12,581 ft TVDSS based on reprocessed 3D seismic, autonomous underwater vehicle (AUV) data and offset well data.

The Kaskida DC1 wells are vertical in the riserless section. BP plans to drill three new wells, with two respud locations, which will be tied back to a new manifold at DC1. The proposed "D" and "E" wells are alternate surface locations and are located approximately 63-202 ft from the primary wells. All wells are within 100 ft of the DC1 manifold and the geologic conditions are expected to be very similar at all well locations. BP plans to drill the proposed wells from a dynamically positioned vessel, therefore an anchoring assessment is not required.

This letter supports the Development Operations Coordination Document (DOCD) and complies with Bureau of Ocean Energy Management (BOEM) guidelines provided in Notice to Lessees (NTL) 2022-G01, 2009-G40, 2008-G04 and 2005-G07 (BOEM 2022, 2009, 2008 and 2005). This letter is supported by an Integrated Shallow Hazards Assessment by Geoscience Earth & Marine Services, Inc. (GEMS, 2024) and a comprehensive Archaeological Assessment by Fugro Geoservices, Inc. (FGSI, 2011). The GEMS report is based on 3D seismic and AUV and FGSI report is based on AUV site survey data, which was acquired in 2008 by Fugro. This letter is intended to supplement those reports with detailed site-specific interpretation conducted by BP at the proposed wellsites using 3D seismic data.

Attachments. Seafloor plates (1, 2, 3, 4 and 5) are centered on the planned KC292 Drill Center 1 manifold. Plates are displayed at a 1 inch = 1,000 ft scale (1:12,000). A 2,000-ft radius circle around the proposed Drill Center manifold is also shown on the Seafloor Plates.

- AUV Seafloor Rendering
- AUV Water Depth and Seafloor Features
- AUV Seafloor Gradient
- AUV Multibeam Backscatter
- AUV Side Scan Sonar Mosaic

The sub-surface plates (6, 7, 8, 9, 10 and 11) accompanying this letter were extracted from the AUV and 3D seismic data and are listed below.

- Sub-Surface Geologic Features
- Portion of AUV Subbottom Line sbp-0030-BPUSAUV08KAS162
- 3D Seismic Section Portion of Inline (12527)
- 3D Seismic Section Portion of Crossline (12772)
- 3D Seismic Frequency Spectrum
- Top-hole Prognosis Chart for Proposed Wellsites "A", "B", "C", "D", AND "E".

3D Seismic Survey Parameters. The 3D Seismic data used for this assessment is based on a Kirchhoff depth migration reprocessing of narrow azimuth towed streamer data acquired over the Kaskida area (Plates 8, 9, and 11). The survey inline and crossline direction are NW-SE and NE-SW, respectively. The inline and crossline bin size is 20.5 ft with a depth interval of 10 ft. The data contains frequencies up to 62 Hz at 6dB at the proposed wellsites (Plate 10). Vertical resolution of the 3D data is estimated to be about 24 ft in the vicinity of the proposed wells.

Autonomous Underwater Vehicle (AUV) Survey Data. The AUV survey was acquired by Fugro in October, 2008. The AUV survey acquired 200 kHz multibeam swath bathymetry (Plates 1 through 3), including backscatter (Plate 4), 120 kHz side scan sonar achieving 200+% coverage over the study area (Plate 5), and sub-bottom profiler data (Plate 7). AUV survey layout consisted of 73 primary lines and 16 tie lines. Line spacing was 200 m (656 ft) for the primary lines and tie lines were spaced 900m (2,953 ft).

Offset Well Data. Relevant information from KC292-1 and KC292-2 wells; and BP's general drilling history within the area, was used to support the assessments made in this report.

Archaeological Resource Survey Requirement. No archaeologically significant objects were identified within 2,000 ft of the proposed well locations (Fugro, 2011).

SEAFLOOR CONDITIONS

Water Depth and Seafloor Gradient. The water depth at the proposed "A", "B", "C", "D", and "E" well locations is predicted to range from 6,078 ft TVDSS to 6,086 ft TVDSS. The depth is derived from AUV Multibeam Bathymetry data (Plates 1 and 2). The local seafloor gradient at the proposed well locations range from 2.6 to about 3.7 degrees to the north-northwest (Plate 3).

Seafloor Features. The proposed wells are situated on a relatively flat area within the basin, surrounded by buried MTD's and seafloor faulting (Plate 2). There are strike-slip faults that are located approximately 800ft east of the proposed DC1 and appears to have penetrated the seafloor based on AUV data. Drill cuttings from KC 292-1 were identified on existing 2008 AUV data, and will not constrain drilling operations at the proposed well locations.

Man-Made Obstructions. There is no existing infrastructure within 2,000 ft of the proposed wellsites (Plate 1). Offset wells KC 292-1 and KC 292-2 are located approximately 2,886 ft SE and 3,121 ft W-SW, respectively, away from the manifold.

Seafloor Debris. Although seafloor debris was identified on the AUV survey data, none was detected within 2000ft of the proposed well locations (Plates 2 and 5). The nearest debris identified in the AUV data is about 4,423ft north of the proposed DC1 manifold, and will not constrain drilling at the proposed well locations. None of the debris is considered archaeologically significant.

Slope Stability. There is no recent slope instability in the area. MTDs identified on the AUV subbottom profiler are older buried features, dating to about 14,000 yrs to 17,000 yrs, that influence the gentle seafloor topography (Plate 7).

Potential High-Density Benthic Communities. There is no geophysical evidence of seafloor hardgrounds or active hydrocarbon seepage features that could potentially support high-density benthic communities within 2,000 ft of the proposed location (Plates 2, 4, and 5) based on the AUV multibeam bathymetry, backscatter, side-scan sonar and sub-bottom profiler data.

SUBSURFACE CONDITIONS

Stratigraphy. The stratigraphy of the top-hole section at the proposed "A", "B", "C", "D", and "E" well locations, as exhibited by the AUV sub-bottom profiler and 3D seismic data, consists of approximately 4,941 ft of deep-water sediments and 1,559 ft of salt between the seafloor and the depth limit of investigation (12,581 ft TVDSS; Plates 7, 8, 9, and 11). The top-hole section comprises predominantly of fine-grained, stacked sequences of laterally extensive clays, silts, and sand interbeds, mass transport deposits, and salt.

The seafloor and nine subsurface horizons (Horizon 1, 2, 3, 3b, 4, 5, 6, 7 and ToS) were mapped in the subsurface study area. These Horizons divide the supra-salt section into ten main units (Units 1 through 10). The stratigraphic interpretations and inferred lithologies are based primarily on the character of the 3D reprocessed seismic, AUV data, and KC 292-1 and KC 292-2 well results. Predicted depths and thicknesses associated with each of the mapped horizons and sequences are displayed on the attached Top-hole Prognosis Chart for the proposed "A", "B", "C", "D", AND "E" drilling locations (Plate 11).

Plate 7 represents the closest South-North sub-bottom profiler line to the proposed well locations, which is about 218 ft east of DC1, and shows an approximate 150 ft thick sequence of laterally extensive hemipelagic clays and silts with interbedded, fine-grained stacked turbidites.

Fault Penetrations. No faults will be penetrated by the wells at DC1 (Plate 8, 9 and 10). Faults near the wellbores are unlikely to have any detrimental effect on drilling operations or the integrity of the wells.

Shallow Gas. No high amplitude anomalies interpreted to represent shallow gas will be penetrated in the top-hole section (Plate 11). There is **Negligible** potential for encountering shallow gas while drilling the top-hole section of the DC1 wells. The closest amplitude anomaly indicative of shallow gas is located about 355ft southeast within Unit 9. Plate 6 shows the distribution of amplitude anomalies mapped from the 3D seismic dataset.

Gas Hydrate. The potential for encountering massive gas hydrate accumulations is ranked as **Negligible** at the proposed wellbores. A bottom simulating reflector (BSR) is not observed in the reprocessed 3D seismic volume. The estimated depth to the base of gas hydrate stability (BGHS) is estimated to be 1,744ft BML at the wells.

Shallow Oil. Staining and white fluorescence, potentially indicative of oil, were observed from cuttings, below the riserless section, just above salt in KC 292-2 well. It is inferred the potential oil in KC 292-2 may be isolated due to the seismic chaotic character in Unit 9 and since no oil was observed in the supra salt sediments in KC 292-1 well. For the purpose of this assessment, it is conservatively assessed there is a **Low** potential for encountering oil in Unit 9 (Plate 11). The remainder of the top-hole section of the proposed wells is ranked as **Negligible** potential for shallow oil.

Shallow Water Flow (SWF). Minor SWF was observed at offset well KC 292-2 but not in KC 292-1 well. The shallow stratigraphy at proposed "A", "B", "C", "D", and "E" wellsite consist of interbedded hemi-pelagic clays, turbidites, channelized turbidites, rapidly deposited mass transport complexes interbedded with thin sands and silts, and allochthonous salt. These rapidly deposited mass transport complexes can be locally over-pressured or have caused underlying sands to become over-pressured.

The potential sand-prone intervals within lower portion of Unit 4 and upper portion of Unit 5 are assessed to have a **Moderate** potential for SWF, which correlate to offset well KC 292-2.

Channeled turbidities and overpressure may be present in this interval. The potential for SWF is ranked **Low** for the upper portion of Unit 6, lower portions of Units 7, 9 and upper portion of Unit 10. The remainder of the top-hole section in the proposed wells is ranked as **Negligible** potential for shallow water flow (Plate 11).

Closing. The proposed wellsites "A", "B", "C", "D", and "E" appear to be generally favorable for well drilling operations. We advise caution based on this assessment but believe the risk of danger to personnel and damage to the borehole, equipment and environment is generally **Low**, provided strict adherence to proper drilling and cementing procedures is followed concerning these hazards until the first pressure containment string is in place.

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December 17, 2024

Reviewed By:

Jason Bronikowski
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December 17, 2024

REFERENCES:

Bureau of Ocean Energy Management, 2022, Notice to lessees and operators of federal oil and gas, and sulphur leases in the Gulf of Mexico outer continental shelf (OCS) region, shallow hazards program: U.S. Department of the Interior, Bureau of Ocean Energy Management, Gulf of Mexico, NTL 2022-G01, Effective Date: October 1, 2022.

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Fugro Geoservices, Inc (FGSI), 2011,"AUV Archaeological Assessment, Kaskida Prospect, Blocks 246-248, 290-292 & 335-336, Keathley Canyon Area Gulf of Mexico", FGSI Report No. 2411-1025

Geoscience Earth & Marine Services, Inc (GEMS), 2024, " Integrated Shallow Hazards Assessment, Blocks 246-248, 290-292, and 335-336, Keathley Canyon Area, Gulf of Mexico.", Project No. GHZ3282.

ATTACHMENTS:

Plate 1 AUV Seafloor Rendering, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 2 AUV Water Depth and Seafloor Features, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 3 AUV Surface Gradient, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 4 AUV Multibeam Backscatter, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 5 AUV Side Scan Sonar Mosaic, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 6 Sub-Surface Geologic Features, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

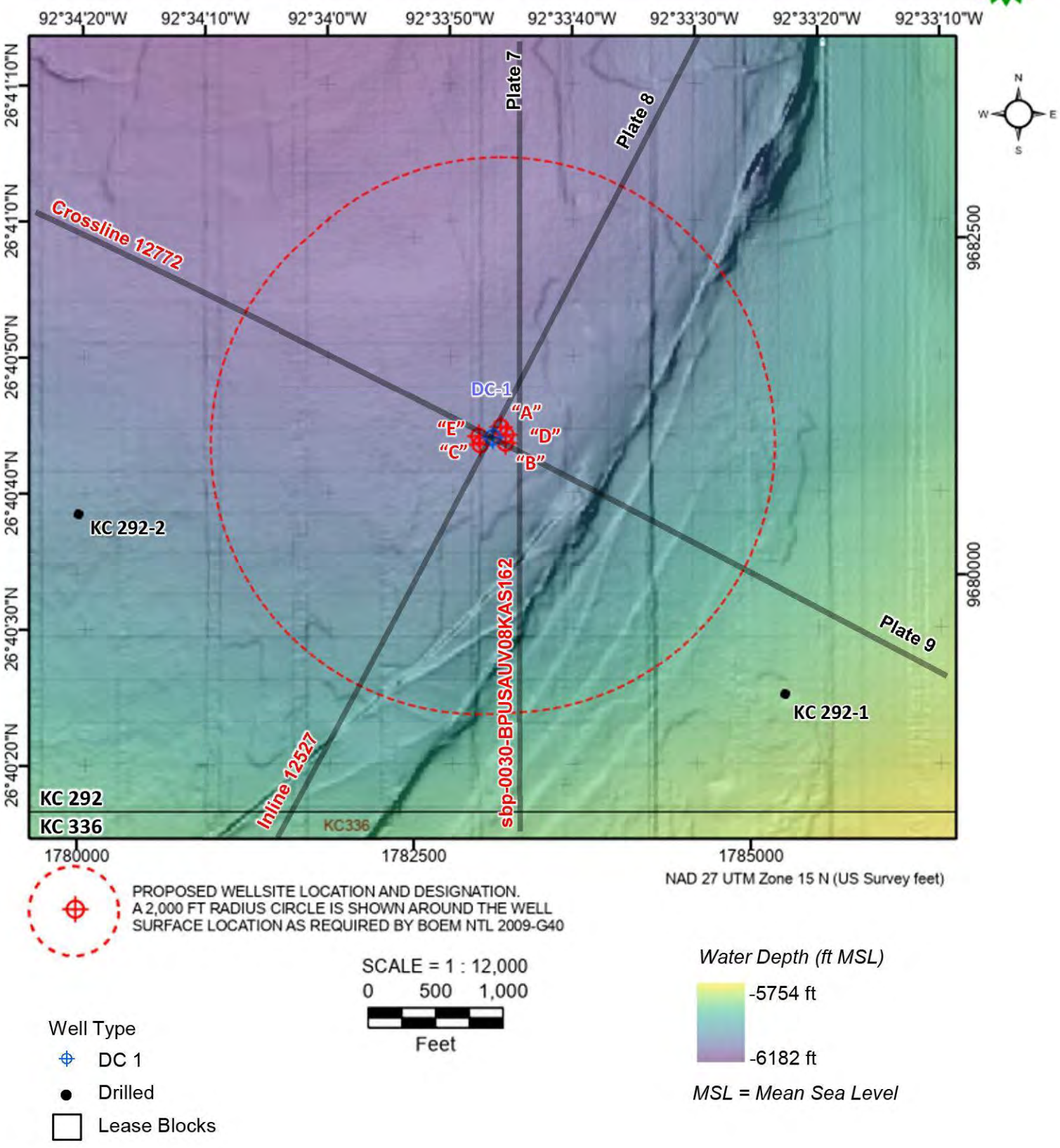
Plate 7 Portion of AUV Subbottom Line sbp-0030-BPUSAUV08KAS162, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 8 3D Seismic Section, Portion of Inline 12527, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 9 3D Seismic Section, Portion of Crossline 12772, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 10 3D Seismic Frequency Spectrum, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 11 Top-hole Prognosis Chart, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"



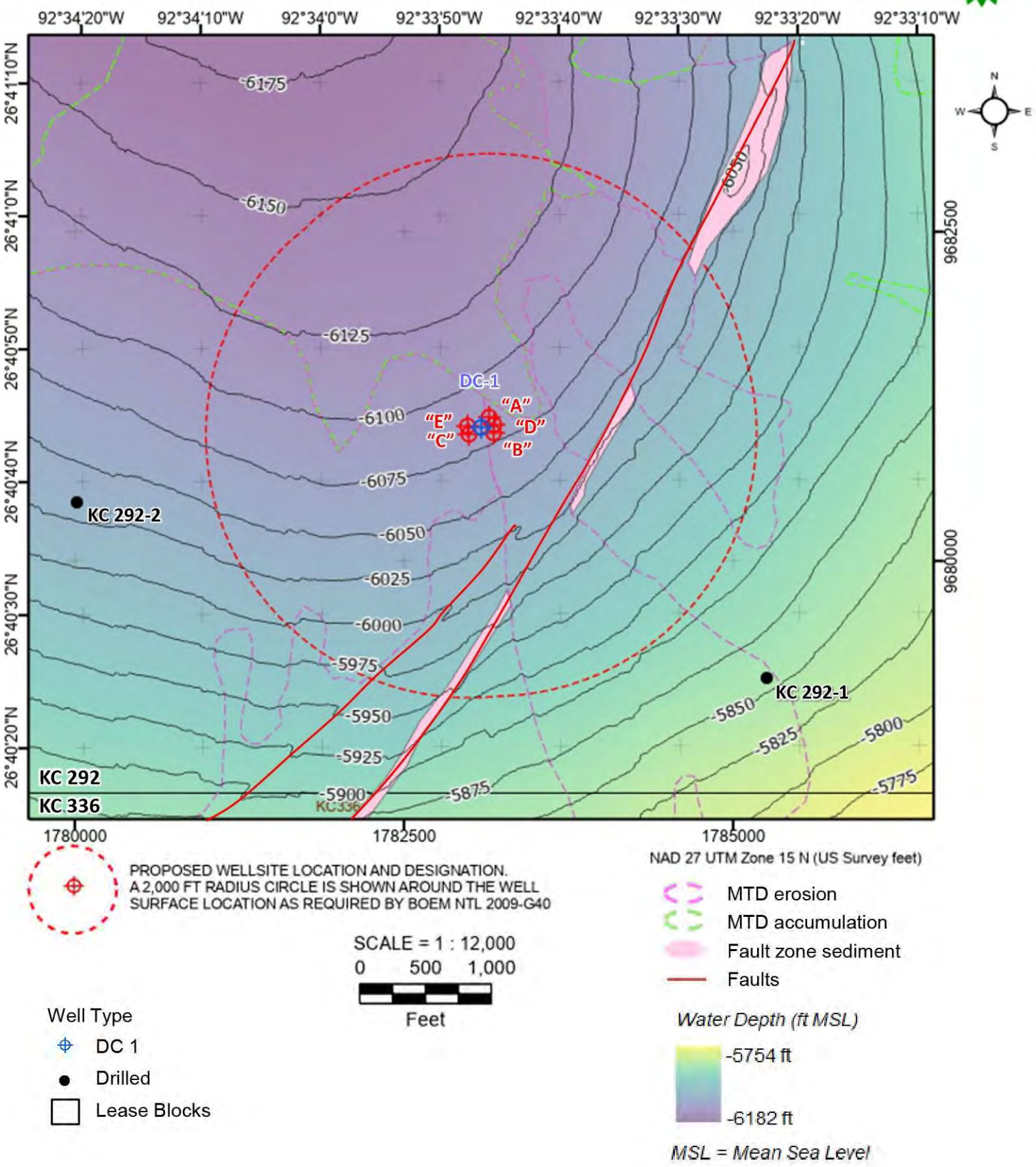
PROPOSED WELLSITE LOCATION AND DESIGNATION.
A 2,000 FT RADIUS CIRCLE IS SHOWN AROUND THE WELL SURFACE LOCATION AS REQUIRED BY BOEM NTL 2009-G40

SCALE = 1 : 12,000
0 500 1,000
Feet

Water Depth (ft MSL)
-5754 ft
-6182 ft
MSL = Mean Sea Level

Well Type
DC 1
Drilled
Lease Blocks

AUV SEAFLOOR RENDERING
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", AND "E"



PROPOSED WELLSITE LOCATION AND DESIGNATION.
A 2,000 FT RADIUS CIRCLE IS SHOWN AROUND THE WELL
SURFACE LOCATION AS REQUIRED BY BOEM NTL 2009-G40

SCALE = 1 : 12,000
0 500 1,000
Feet

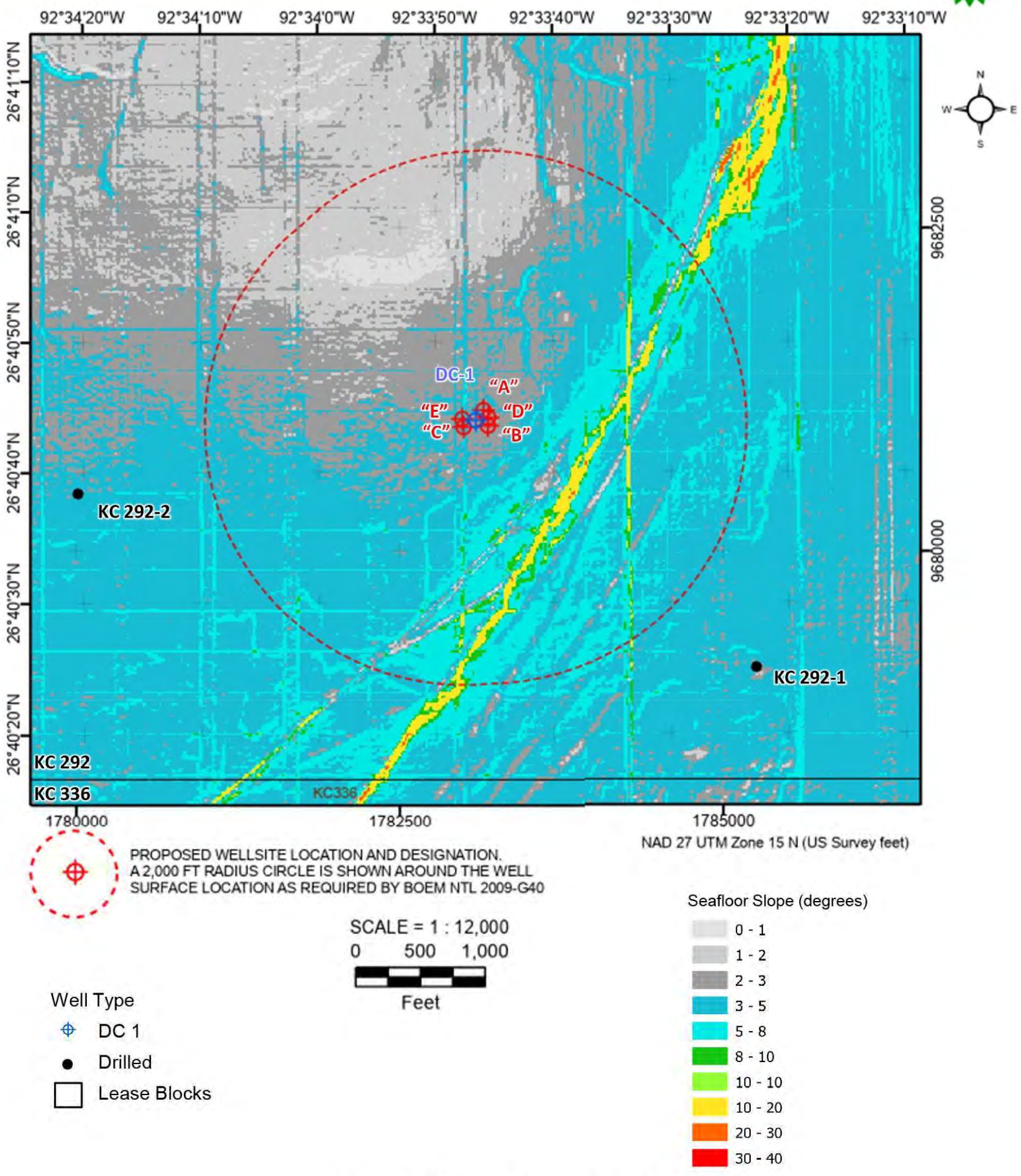
MTD erosion
MTD accumulation
Fault zone sediment
Faults

Well Type
DC 1
Drilled
Lease Blocks

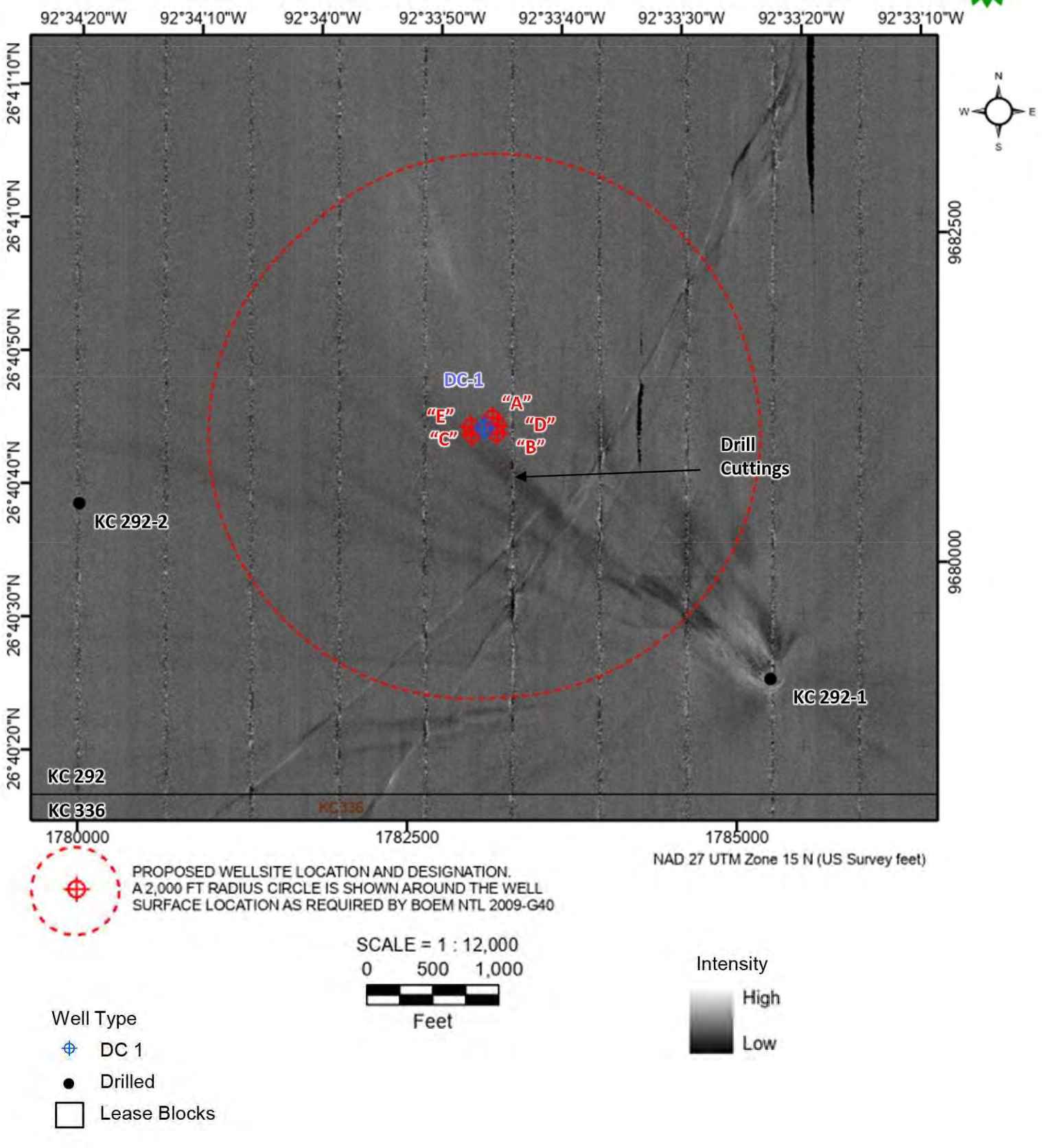
Water Depth (ft MSL)
-5754 ft
-6182 ft

MSL = Mean Sea Level

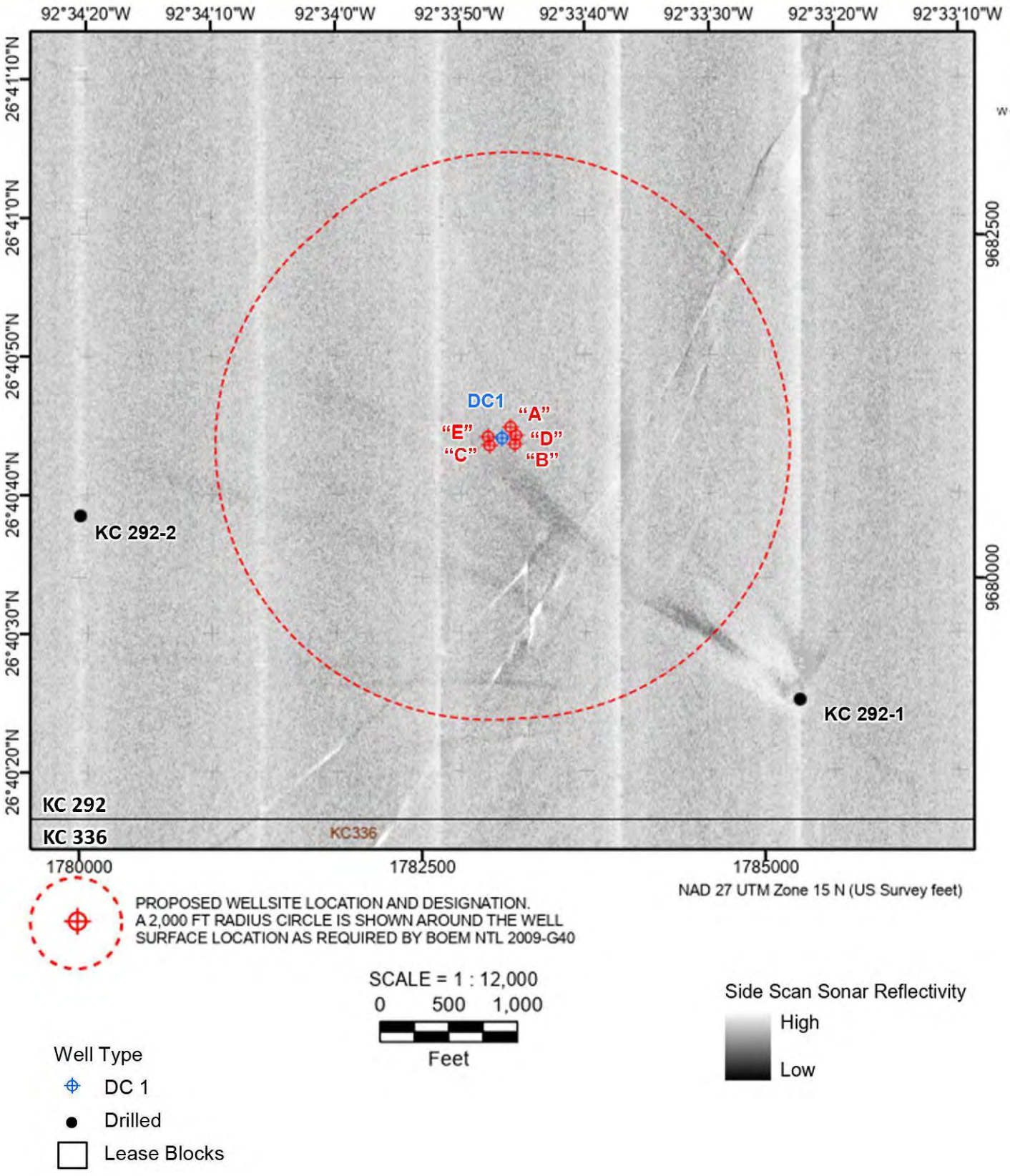
AUV WATER DEPTH AND SEAFLOOR FEATURES
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", AND "E"



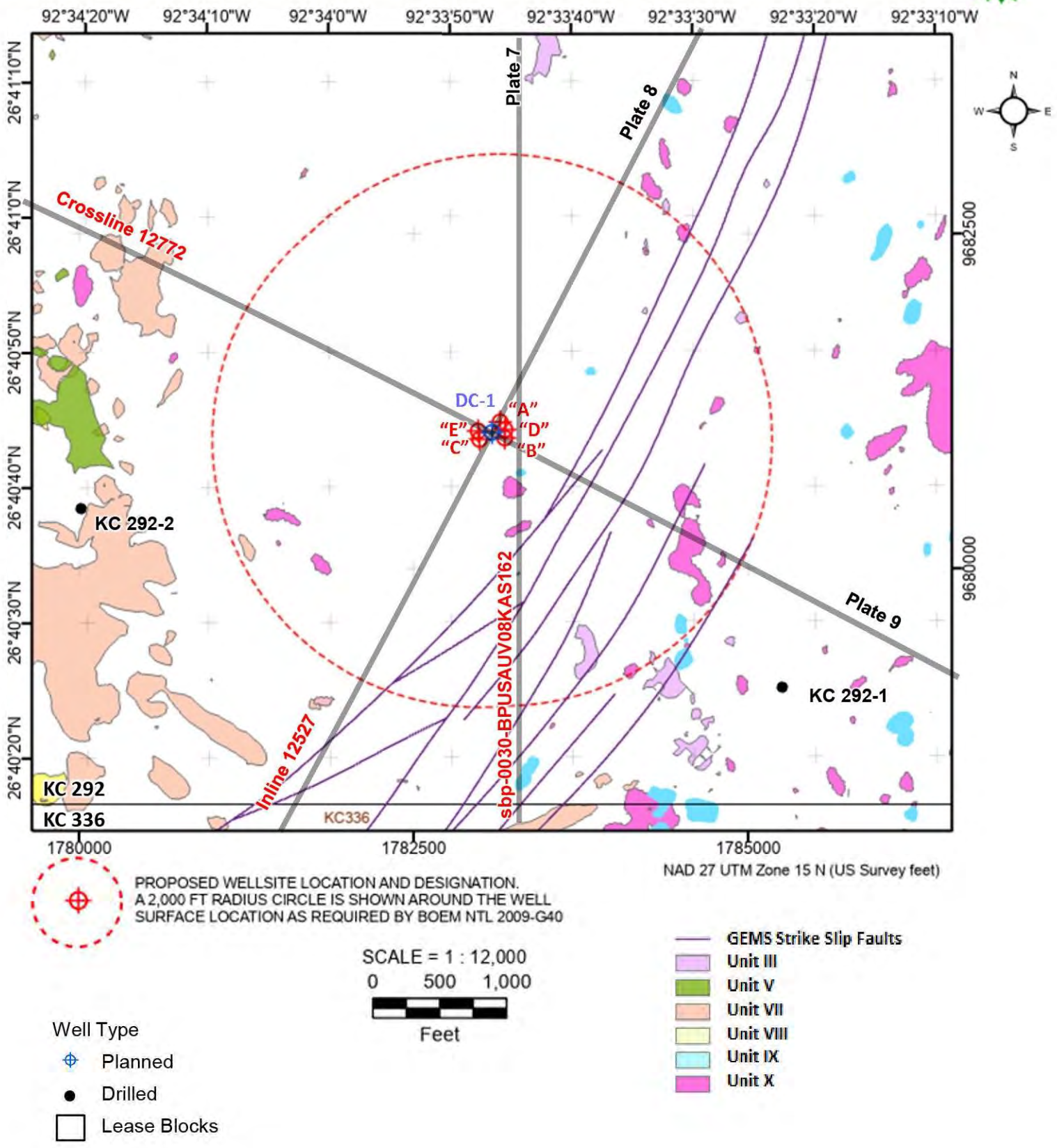
AUV SEAFLOOR GRADIENT
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", AND "E"



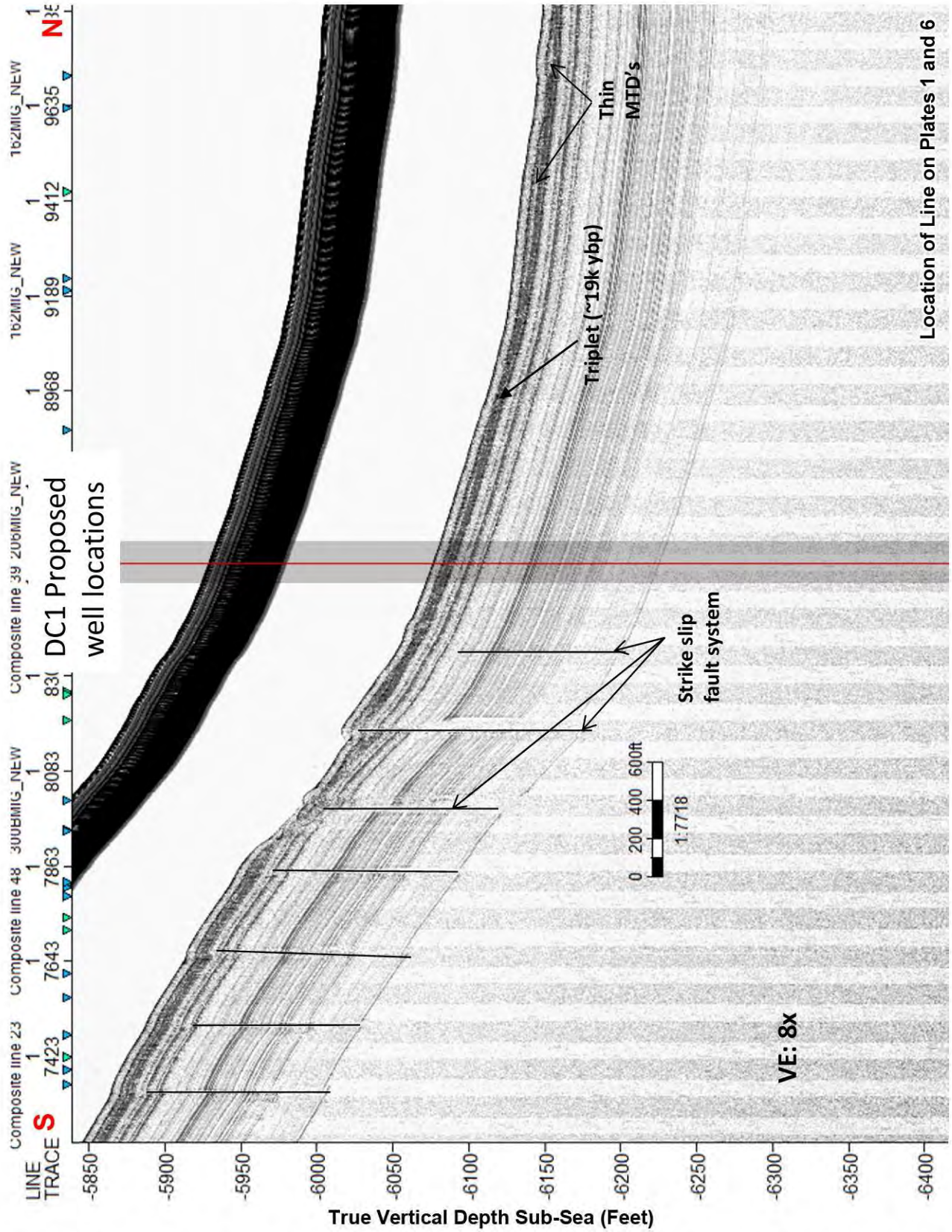
AUV MULTIBEAM BACKSCATTER
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", AND "E"



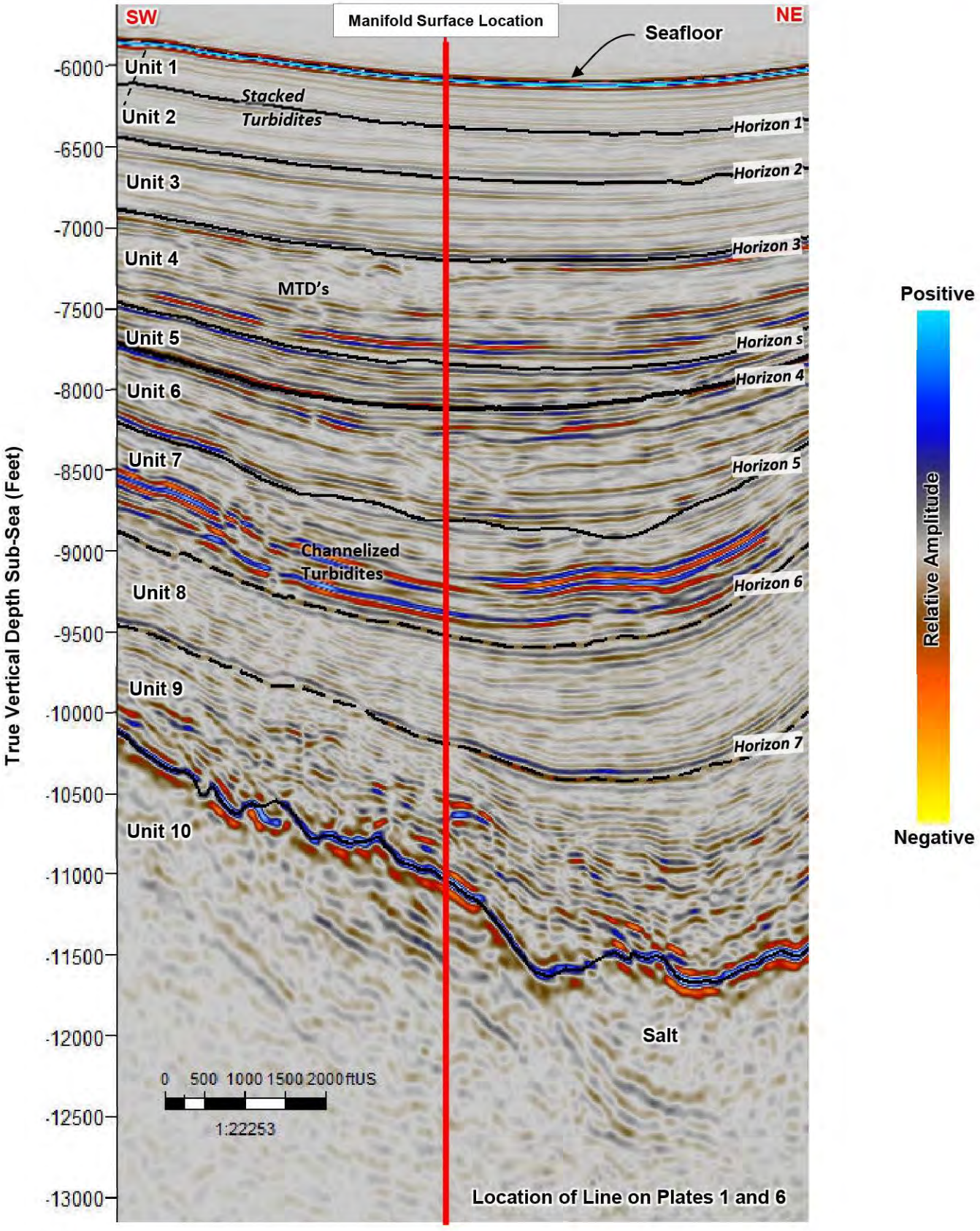
AUV SIDE SCAN SONAR MOSAIC
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", AND "E"



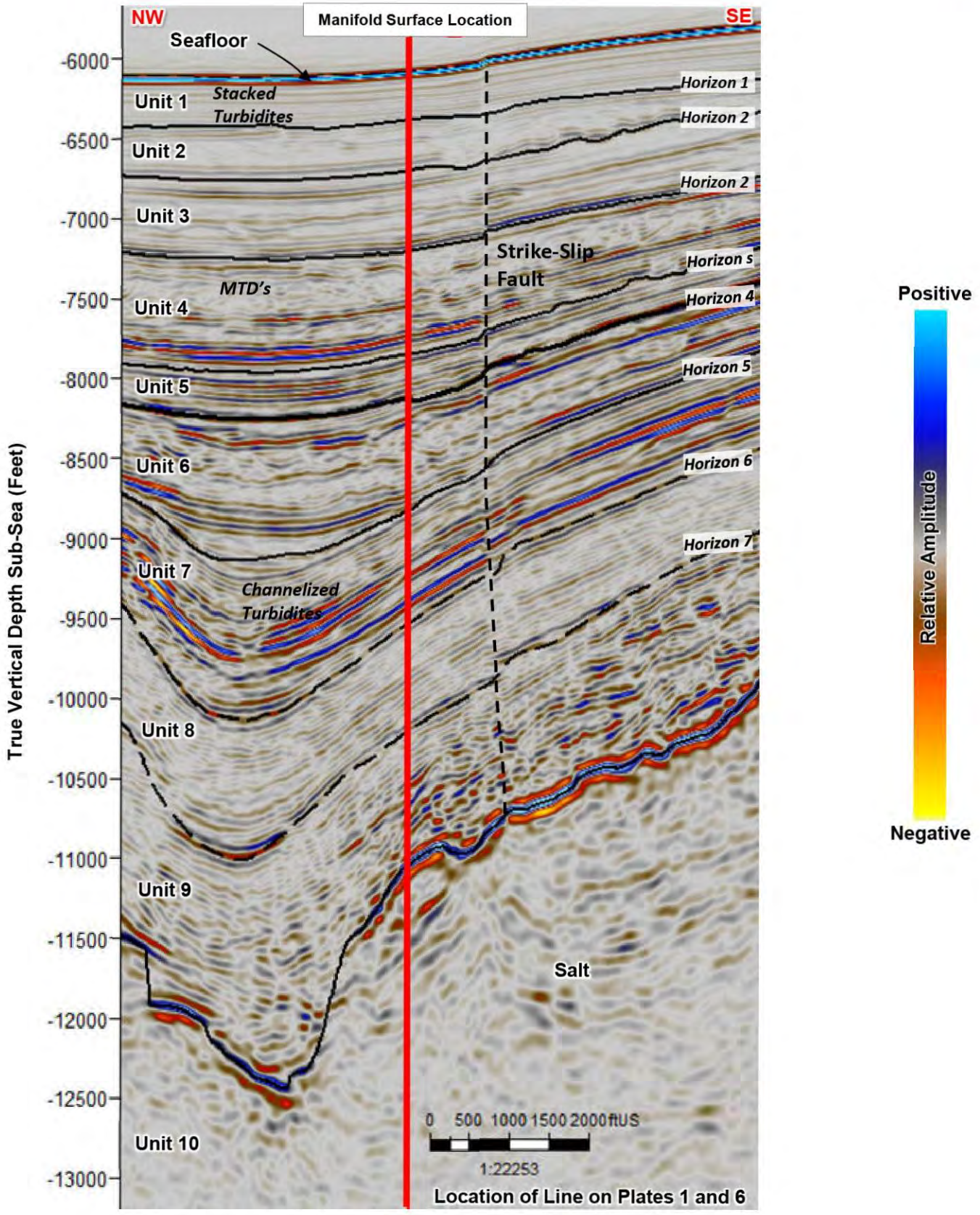
SUB-SURFACE GEOLOGIC FEATURES
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", AND "E"



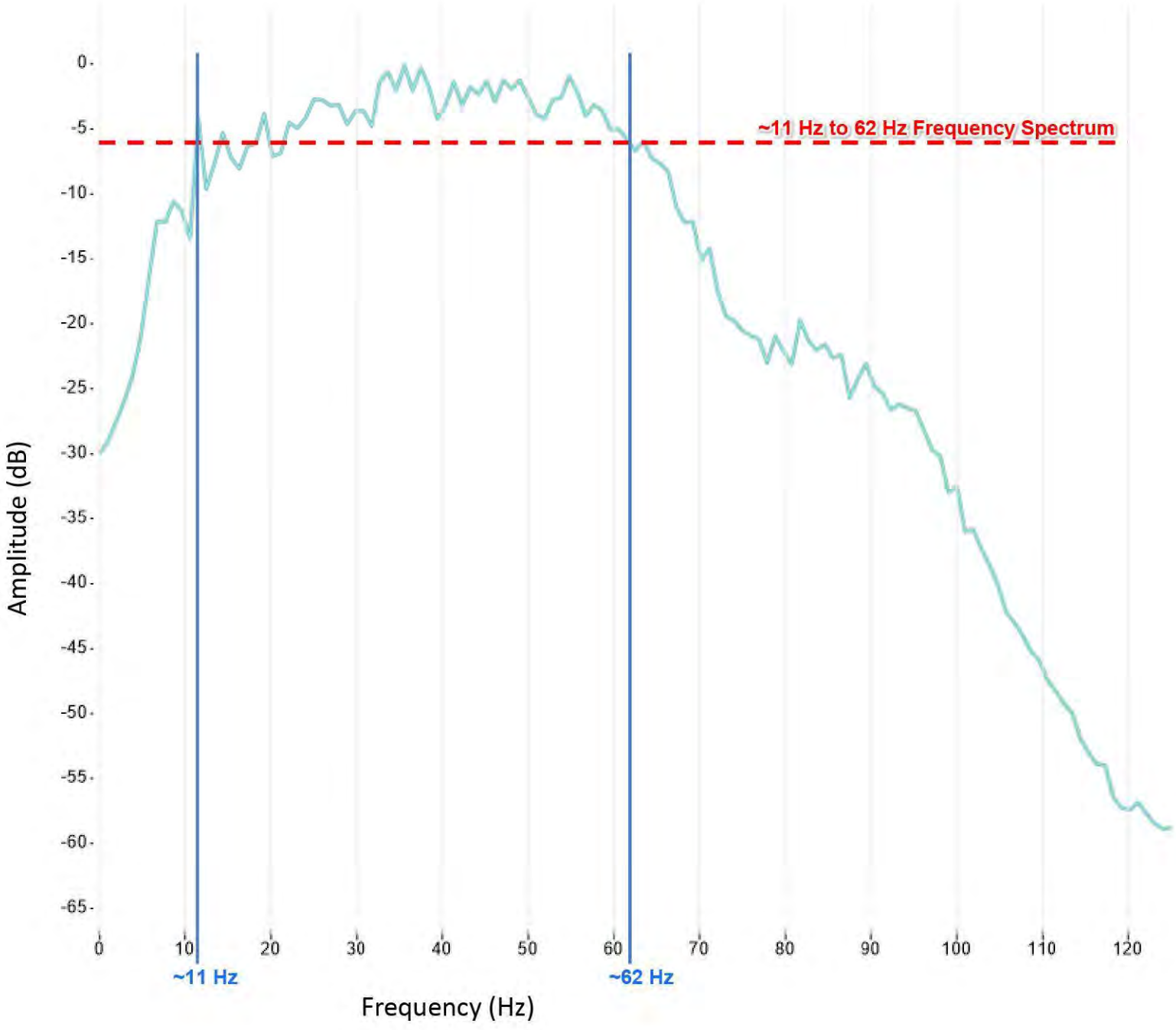
PORTION OF AUV SUBBOTTOM LINE sbp-0030-BPUSAUV08KAS162
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", AND "E"



3D SEISMIC SECTION PORTION OF INLINE 12527
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", AND "E"

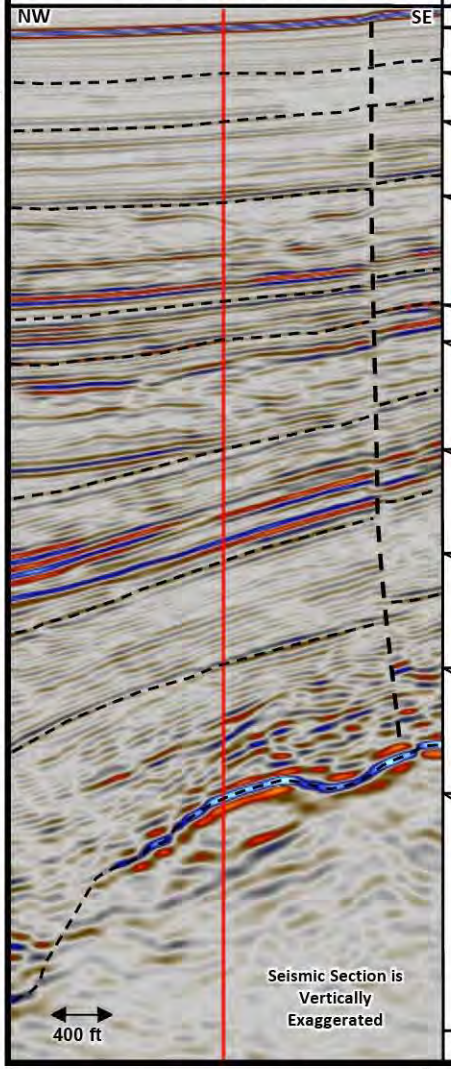


3D SEISMIC SECTION PORTION OF CROSSLINE 12772
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", AND "E"



3D SEISMIC FREQUENCY SPECTRUM
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", AND "E"

BP AMERICA INC.
SITE CLEARANCE LETTER, PROPOSED DRILL CENTER 1 KC 292 "A", "B", "C", "D", and "E"
KEATHLEY CANYON, GULF OF MEXICO



Horizon & Unit	Inferred Lithology & Top-hole Conditions	BML (Feet)	TVDSS (Feet)	THICKNESS (Feet)	SHALLOW GAS POTENTIAL	SHALLOW OIL POTENTIAL	SHALLOW WATER FLOW POTENTIAL
Seafloor	*Seafloor slopes ~2.8° to the northwest*						
		0	6,081				
Horizon 1 (Unit 1)	*Soft to very stiff clays underlain by laminated clays and silty clays.*			292	Negligible	Negligible	Negligible
		292	6,373				
Horizon 2 (Unit 2)	*Debris flows and channelized turbidites. Clays/silts.*			316	Negligible	Negligible	Negligible
	Channelized interval with silts and sands						
Horizon 3 (Unit 3)	*Sand prone channelized turbidite with thin silts and mass transport deposits. Clays with silt to sandy intervals.*	608	6,689	509	Negligible	Negligible	Negligible
		1,117	7,198				
BGHS Horizon S (Unit 4)	*Mass transport deposits. Clay, silt, & thin sands possible. Alternating channelized sand and silt intervals.*			648	Negligible	Negligible	Negligible
	Predicted base of gas hydrate stability	1,744	7,825				Moderate
Horizon 4 (Unit 5)	*Channelized turbidites and mass transport deposits. Silty to sandy intervals.*	1,765	7,846	252	Negligible	Negligible	Negligible
		2,017	8,098				Low
Horizon 5 (Unit 6)	*Channelized turbidites and mass transport deposits. Clay, silt, & sand*			717	Negligible	Negligible	Negligible
	Mass transport deposits and slumped turbidites. Clay, silt, & sand	2,734	8,815				
Horizon 6 (Unit 7)	*Slumped and channelized turbidites. Mass transport deposits. Clays and silts, possibly sand.*			611	Negligible	Negligible	Negligible
	Channelized turbidites and thin mass transport sediments. Clay, silt, and sand.	3,345	9,426				Low
Horizon 7 (Unit 8)	*Mass transport deposits and slumped turbidites.*			766	Negligible	Negligible	Negligible
	Clay with thin sands and silts possible.	4,111	10,192				
Top of Salt (Unit 9)	*Turbidites and mass transport deposits. Clay with silty to sandy intervals.*			830	Negligible	Negligible	Negligible
	Clays, silts and sands.	4,941	11,022			Low	Low
	InterSalt Seismic Anomaly (ISSA).			1,559	Negligible	Negligible	Low
	Interpreted clean allochthonous Salt.	6,500	12,581				Negligible
(Depth Limit of Investigation)							

Risk Scale: Negligible | Low | Moderate | High

Surface Locations at
"A": X = 1,783,146.78 ft , Y = 9,681,098.78 ft ;
"B": X = 1,783,180.29 ft , Y = 9,680,977.05 ft ;
"C": X = 1,782,996.80 ft , Y = 9,680,966.47 ft ;
"D": X = 1,783,185.71 ft , Y = 9,681,039.82 ft ;
"E": X = 1,782,984.27 ft , Y = 9,681,028.21 ft ;

UTM Zone 15 N (US ft) Geodetic Datum: NAD 1927

- *Note depths and horizons are relative to well location.*
- *MTD = Mass Transport Deposits*

BML = Below Mudline
BGHS = Base of Gas Hydrate Stability
TVDSS = True Vertical Depth Subsea

TOP-HOLE PROGNOSIS CHART,
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED DRILL CENTER 1 KC 292 "A", "B", "C", "D", and "E"

Plate 11

SITE CLEARANCE LETTER
KASKIDA PROPOSED DRILL CENTER 2, BLOCK 292, OCS-G25792 KEATHLEY CANYON AREA

PROPOSED SURFACE LOCATION – DC2 WELL "A"	
92° 34' 42.024" W	26° 40' 46.333" N
X = 1,778,060.78 ft E	Y = 9,681,231.78 ft N
2,994 FSL	3,979 FWL
Water Depth:	6,028 ft below MSL
PROPOSED SURFACE LOCATION – DC2 WELL "B"	
92° 34' 41.659" W	26° 40' 45.126" N
X = 1,778,094.29 ft E	Y = 9,681,110.06 ft N
2,872 FSL	4,013 FWL
Water Depth:	6,024 ft below MSL
PROPOSED SURFACE LOCATION – DC2 WELL "C"	
92° 34' 43.682" W	26° 40' 45.026" N
X = 1,777,910.87 ft E	Y = 9,681,099.40 ft N
2,861 FSL	3,829 FWL
Water Depth:	6,023 ft below MSL
PROPOSED SURFACE LOCATION –DC2 ALTERNATE WELL "D"	
92° 34' 41.596" W	26° 40' 45.747" N
X = 1,778,099.79 ft E	Y = 9,681,172.82 ft N
2,934 FSL	4,018 FWL
Water Depth:	6,026 ft below MSL
PROPOSED SURFACE LOCATION –DC2 ALTERNATE WELL "E"	
92° 34' 43.819" W	26° 40' 45.639" N
X = 1,777,898.26 ft E	Y = 9,681,161.21 ft N
2,921 FSL	3,848 FWL
Water Depth:	6,025 ft below MSL

X and Y Coordinates in UTM 15N (US Survey ft)
Geodetic Datum: NAD 1927
Spheroid: Clarke 1866

KASKIDA DRILL CENTER 2 WELLS "A", "B", "C", "D" AND "E"

BLOCK 292, OCS-G25792

KEATHLEY CANYON AREA, GULF OF MEXICO, USA

Introduction. This wellsite clearance letter addresses the shallow hazards for proposed wellsites "A", "B", "C", "D", and "E", at the Kaskida Drill Center 2 (DC2) in Block 292, Keathley Canyon, Gulf of Mexico (OCS-G25792). This letter is intended to address specific seafloor and shallow geologic conditions within 2,000 ft of the proposed wellsites from the seafloor (about 6,025ft Total Vertical Depth Sub-Sea; TVDSS) to about 12,525 ft TVDSS based on reprocessed 3D seismic, autonomous underwater vehicle (AUV) data and offset well data.

The Kaskida DC2 wells are vertical in the riserless section. BP plans to drill three new wells, with two respud locations, which will be tied back to a new manifold at DC2. The proposed "D" and "E" wells are alternate surface locations and are located approximately 63-210 ft from the primary wells. All wells are within 100 ft of the DC2 manifold and the geologic conditions are expected to be very similar at all well locations. BP plans to drill the proposed wells from a dynamically positioned vessel, therefore an anchoring assessment is not required.

This letter supports the Development Operations Coordination Document (DOCD) and complies with Bureau of Ocean Energy Management (BOEM) guidelines provided in Notice to Lessees (NTL) 2022-G01, 2009-G40, 2008-G04 and 2005-G07 (BOEM 2022, 2009, 2008 and 2005). This letter is supported by a Shallow Hazards Assessment by Geoscience Earth & Marine Services, Inc. (GEMS, 2024) and a comprehensive Archaeological Assessment by Fugro Geoservices, Inc. (FGSI, 2011). The GEMS report is based on 3D seismic and AUV and FGSI report is based on AUV site survey data, which was acquired in 2008 by Fugro. This letter is intended to supplement those reports with detailed site-specific interpretation conducted by BP at the proposed wellsites using 3D seismic data.

Attachments. Seafloor plates (1, 2, 3, 4 and 5) are centered on the planned KC292 Drill Center 2 manifold. Plates are displayed at a 1 inch = 1,000 ft scale (1:12,000). A 2,000-ft radius circle around the proposed well locations is shown on the Seafloor Plates.

- AUV Seafloor Rendering
- AUV Water Depth and Seafloor Features
- AUV Seafloor Gradient
- AUV Multibeam Backscatter
- AUV Side Scan Sonar Mosaic

The sub-surface plates (6, 7, 8, 9, 10 and 11) accompanying this letter were extracted from the AUV and 3D data volumes and are listed below.

- Sub-Surface Geologic Features
- Portion of AUV Subbottom Lines sbp-0029-BPUSAUV08KAS206a and sbp-0029-BPUSAUV08KAS154
- 3D Seismic Section Portion of Inline (12751)
- 3D Seismic Section Portion of Crossline (12666)
- 3D Seismic Frequency Spectrum
- Top-hole Prognosis Chart for Proposed Wellsites "A", "B", "C", "D", and "E"

3D Seismic Survey Parameters. The 3D Seismic data used for this assessment is based on a Kirchhoff depth migration reprocessing of narrow azimuth towed streamer data acquired over the Kaskida area (Plates 8, 9, and 11). The survey inline and crossline direction are NW-SE and NE-SW, respectively. The inline and crossline bin size is 20.5 ft with a depth interval of 10 ft. The data contains frequencies up to 66 Hz at 6dB at the proposed wellsites (Plate 10). Vertical resolution of the 3D data is estimated to be about 24 ft in the vicinity of the proposed wells.

Autonomous Underwater Vehicle (AUV) Survey Data. The AUV survey was acquired by Fugro in October, 2008. The AUV survey acquired 200 kHz multibeam swath bathymetry (Plates 1 through 3), including backscatter (Plate 4), 120 kHz side scan sonar achieving 200+% coverage over the study area (Plate 5), and sub-bottom profiler data (Plate 7). AUV survey layout consisted of 73 primary lines and 16 tie lines. Line spacing was 200 m (656 ft) for the primary lines and tie lines were spaced 900m (2,953 ft).

Offset Well Data. Relevant information from KC292-1 and KC292-2 wells; and BP's general drilling history within the area, was used to support the assessments made in this report.

Archaeological Resource Survey Requirement. No archaeologically significant objects were identified within 2,000 ft of the proposed well locations (Fugro, 2011).

SEAFLOOR CONDITIONS

Water Depth and Seafloor Gradient. The water depth at the proposed "A", "B", "C", "D", and "E" well locations is predicted to range from 6,023 ft TVDSS to 6,028 ft TVDSS. The depth is derived from AUV Multibeam Bathymetry data (Plates 1 and 2). The local seafloor gradient at the well locations range from 2.0 to 2.4 degrees to the north and northeast (Plate 3).

Seafloor Features. The proposed wells are situated on a relatively flat area surrounded by buried MTD's and seafloor faulting (Plates 2).

Man-Made Obstructions. There is no existing infrastructure within 2,000 ft of the proposed wellsites (Plate 1). Offset wells KC 292-1 and KC 292-2 are located approximately 7,537 ft SE and 2,139 ft SE, respectively, away from the manifold.

Seafloor Debris. Although seafloor debris was identified on the AUV survey data, none was detected within 2000ft of the proposed well locations (Plate 2 and 5). The nearest debris identified in the AUV data is about 4,370 ft south of the proposed DC2 manifold, and will not constrain drilling at the proposed well locations. None of the debris is considered archaeologically significant.

Slope Stability. There is no recent slope instability in the area. MTD's identified on the AUV subbottom profiler are older buried features, dating to about 14,000 yrs- 17,000 yrs, that influence the gentle seafloor topography.

Potential High-Density Benthic Communities. There is no geophysical evidence of seafloor hardgrounds or active hydrocarbon seepage features that could potentially support high-density benthic communities within 2,000 ft of the proposed location (Plates 2, 4, and 5) based on the AUV multibeam bathymetry, backscatter, side-scan sonar and sub-bottom profiler data.

SUBSURFACE CONDITIONS

Stratigraphy. The stratigraphy of the top-hole section at the proposed "A", "B", "C", "D", and "E" well locations, as exhibited by the AUV sub-bottom profiler and reprocessed 3D seismic data, consists of approximately 4,465 ft of deep-water sediments and 2,035 ft of salt between the seafloor and the depth limit of investigation (12,525 ft TVDSS; Plates 7, 8, 9, and 11). The top-hole section comprises predominantly of fine-grained, stacked sequences of laterally extensive clays, silts, and sand interbeds, mass transport deposits, and salt.

The seafloor and nine subsurface horizons (Horizon 1, 2, 3, 3b, 4, 5, 6, 7 and ToS) were mapped in the subsurface study area. These Horizons divide the supra-salt section into ten main units (Units 1 through 10). The stratigraphic interpretations and inferred lithologies are based primarily on the character of the 3D reprocessed seismic, AUV data, and KC 292-1 and KC 292-2 well results. Predicted depths and thicknesses associated with each of the mapped horizons and sequences are displayed on the attached Top-hole Prognosis Chart for the proposed "A", "B", "C", "D", and "E" drilling locations (Plate 11).

Plate 7 represents the closest sub-bottom profiler lines to the proposed well locations, which are 147 ft north and 53 ft east of the DC2 manifold, and shows an approximate 150 ft thick sequence of laterally extensive hemipelagic clays and silts with interbedded, fine grained stacked turbidites.

Fault Penetrations. Two buried faults will be penetrated by the wells at DC2 (Plate 8, 9 and 11). The first fault (Fault 1) is in Unit 7 at approximately 9,010ft TVDSS. The second fault (Fault 2) is near the top of Unit IX at approximately 9,772ft TVDSS. These faults are unlikely to have any detrimental effect on drilling operations or the integrity of the well.

Shallow Gas. No high amplitude anomalies interpreted to represent shallow gas will be penetrated in the top-hole section (Plate 11). There is **Negligible** potential for encountering shallow gas while drilling the top-hole section of the DC2 wells. The closest amplitude anomaly indicative of shallow gas is located about 250ft northwest of the DC2 manifold within Unit 6. Plate 6 shows the distribution of amplitude anomalies mapped from the reprocessed 3D seismic dataset.

Gas Hydrate. The potential for encountering massive gas hydrate accumulations is ranked as **Negligible** at the proposed wellbores. A bottom simulating reflector (BSR) is not observed in the reprocessed 3D seismic volume. The estimated depth to the base of gas hydrate stability (BGHS) is estimated to be 1,736 ft BML at the wells.

Shallow Oil. Staining and white fluorescence, potentially indicative of oil, were observed from cuttings, below the riserless section, just above salt in KC 292-2 well. It is inferred the potential oil in KC 292-2 may be isolated due to the seismic chaotic character in Unit 9 and since no oil was observed in the supra salt sediments in KC 292-1 well. For the purpose of this assessment, it is conservatively assessed there is a **Low** potential for encountering oil in Unit 9 (Plate 11). The remainder of the top-hole section of the proposed wells is ranked as **Negligible** potential for shallow oil.

Shallow Water Flow (SWF). Minor SWF was observed at offset well KC 292-2 but not in KC 292-1 well. The shallow stratigraphy at proposed "A", "B", "C", "D", and "E" wellsite consist of interbedded hemi-pelagic clays, turbidites, channelized turbidites, rapidly deposited mass transport complexes interbedded with thin sands and silts, and allochthonous salt. These rapidly deposited mass transport complexes can be locally over-pressured or have caused underlying sands to become over-pressured.

The potential sand-prone intervals within lower portion of Unit 4 and upper portion of Unit 5 are assessed to have a **Moderate** potential for SWF, which correlate to offset well KC 292-2. Channeled turbidities and overpressure may be present in this interval. The potential for SWF is ranked **Low** for the upper and lower portions of Unit 6, and lower portion of Units 7. The remainder of the top-hole section in the proposed wells is ranked as **Negligible** potential for shallow water flow.

Closing. The proposed wellsites "A", "B", "C", "D", and "E" appear to be generally favorable for well drilling operations. We advise caution based on this assessment but believe the risk of danger to personnel and damage to the borehole, equipment and environment is generally **Low**, provided strict adherence to proper drilling and cementing procedures is followed concerning these hazards until the first pressure containment string is in place.

Prepared By:

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December 17, 2024

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BP America, Inc.

December 17, 2024

REFERENCES:

Bureau of Ocean Energy Management, 2022, Notice to lessees and operators of federal oil and gas, and sulphur leases in the Gulf of Mexico outer continental shelf (OCS) region, shallow hazards program: U.S. Department of the Interior, Bureau of Ocean Energy Management, Gulf of Mexico, NTL 2022-G01, Effective Date: October 1, 2022.

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Geoscience Earth & Marine Services, Inc (GEMS), 2024, " Integrated Shallow Hazards Assessment, Blocks 246-248, 290-292, and 335-336, Keathley Canyon Area, Gulf of Mexico.", Project No. GHZ3282.

ATTACHMENTS:

Plate 1 AUV Seafloor Rendering, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 2 AUV Water Depth and Seafloor Features, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 3 AUV Surface Gradient, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 4 AUV Multibeam Backscatter, Kaskida, Block 292, Keathley Canyon Area, Drill Center 2 "A", "B", "C", "D", AND "E"

Plate 5 AUV Side Scan Sonar Mosaic, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 6 Sub-Surface Geologic Features, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 7 Portion of AUV Composite Subbottom Lines sbp-0029-BPUSAUV08KAS206a and sbp-0029-BPUSAUV08KAS154, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

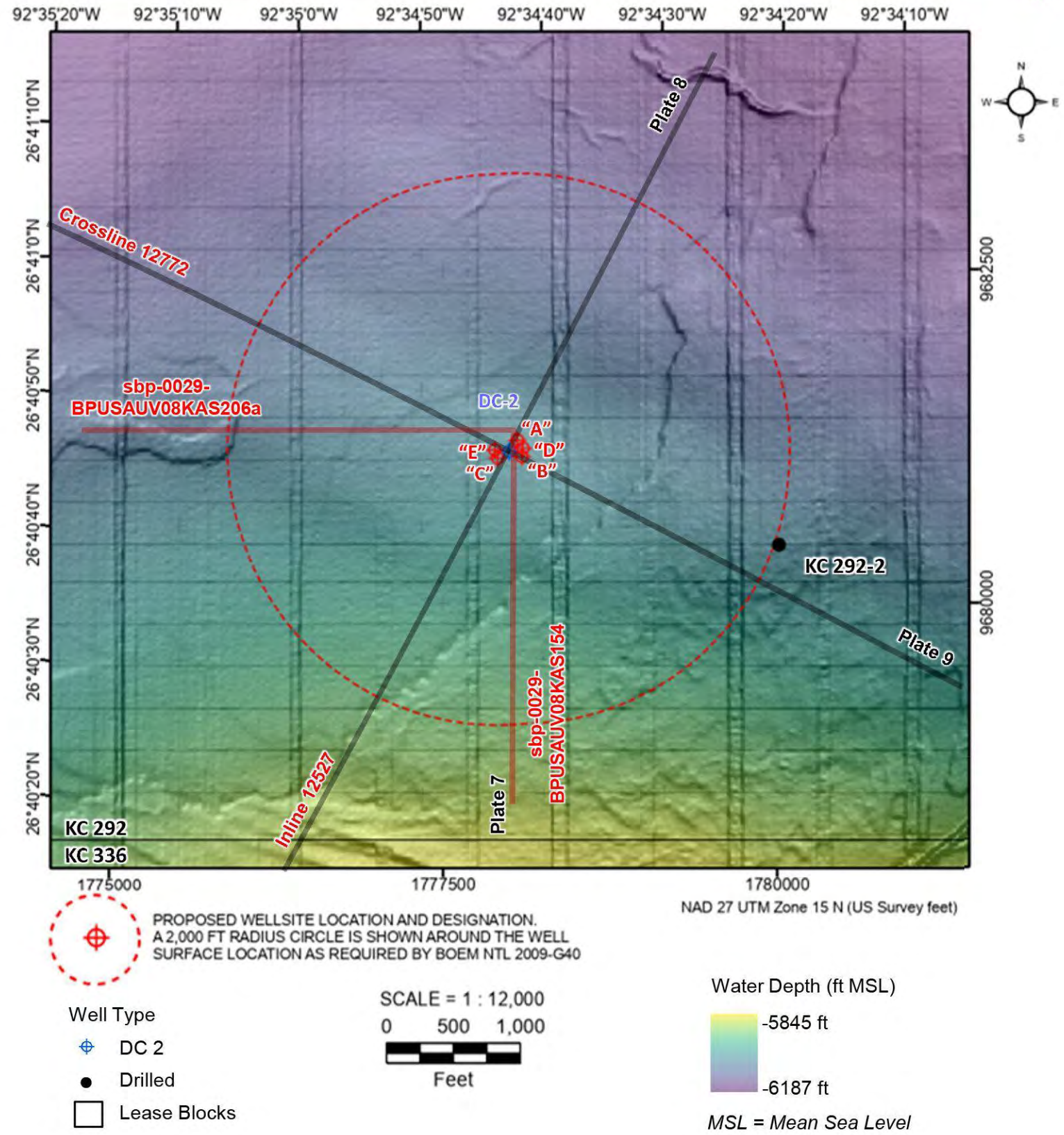
Plate 8 3D Seismic Section, Portion of Inline 12751, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 9 3D Seismic Section, Portion of Crossline 12666, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 10 3D Seismic Frequency Spectrum, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

Plate 11 Top-hole Prognosis Chart, Kaskida, Block 292, Keathley Canyon Area, Proposed Wellsites "A", "B", "C", "D", AND "E"

BP AMERICA INC.
SITE CLEARANCE LETTER, PROPOSED "A", "B", "C", "D" AND "E" LOCATIONS, BLOCK 292, KEATHLEY CANYON, GULF OF MEXICO



PROPOSED WELLSITE LOCATION AND DESIGNATION.
A 2,000 FT RADIUS CIRCLE IS SHOWN AROUND THE WELL SURFACE LOCATION AS REQUIRED BY BOEM NTL 2009-G40

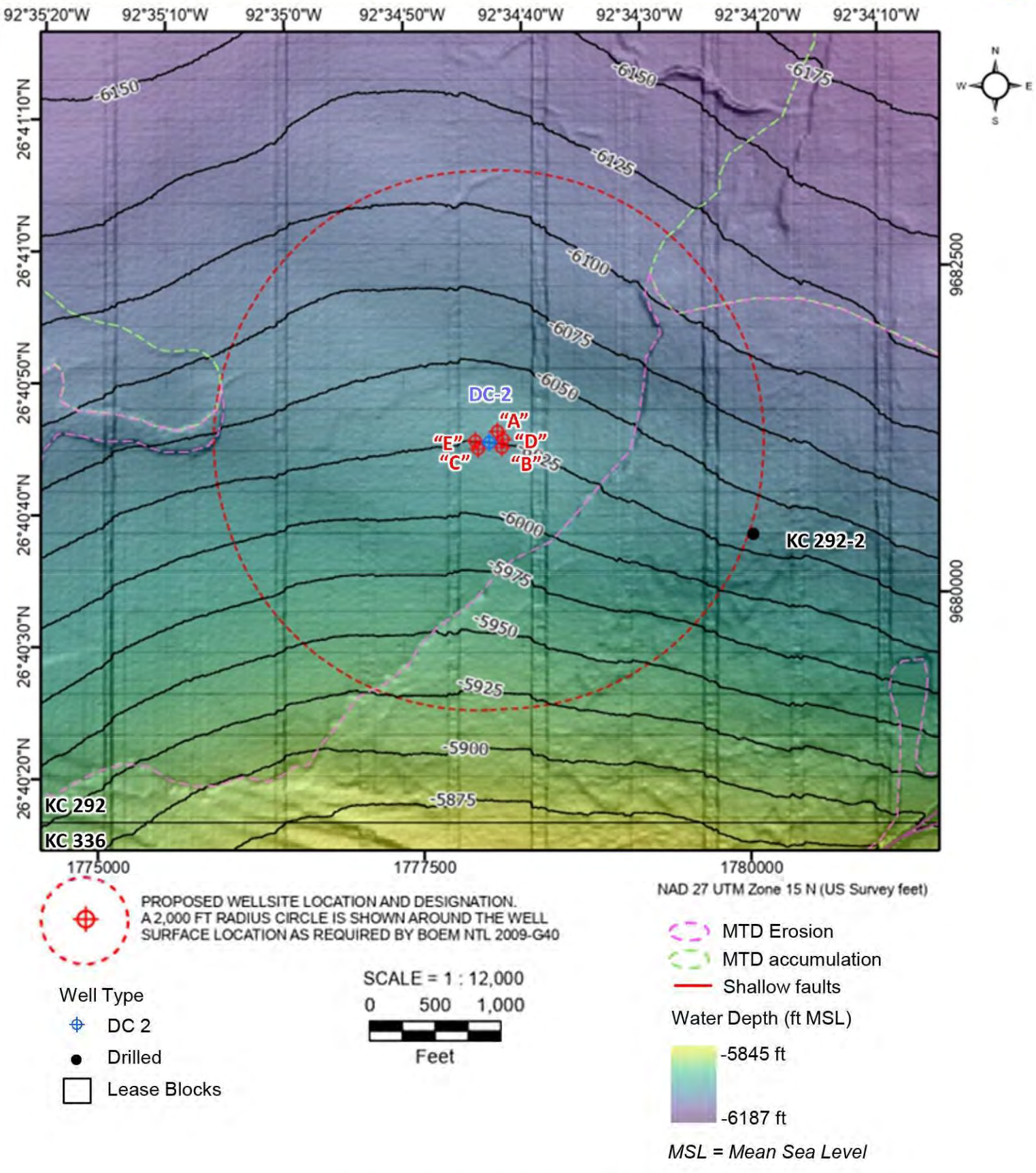
Well Type
- DC 2
- Drilled
- Lease Blocks

SCALE = 1 : 12,000
0 500 1,000
Feet

Water Depth (ft MSL)
-5845 ft
-6187 ft
MSL = Mean Sea Level

AUV SEAFLOOR RENDERING
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D" AND "E"

BP AMERICA INC.
SITE CLEARANCE LETTER, PROPOSED "A", "B", "C", "D" AND "E" LOCATIONS, BLOCK 292, KEATHLEY CANYON, GULF OF MEXICO



PROPOSED WELLSITE LOCATION AND DESIGNATION.
A 2,000 FT RADIUS CIRCLE IS SHOWN AROUND THE WELL SURFACE LOCATION AS REQUIRED BY BOEM NTL 2009-G40

NAD 27 UTM Zone 15 N (US Survey feet)

SCALE = 1 : 12,000
0 500 1,000
Feet

Well Type
- DC 2
- Drilled
- Lease Blocks

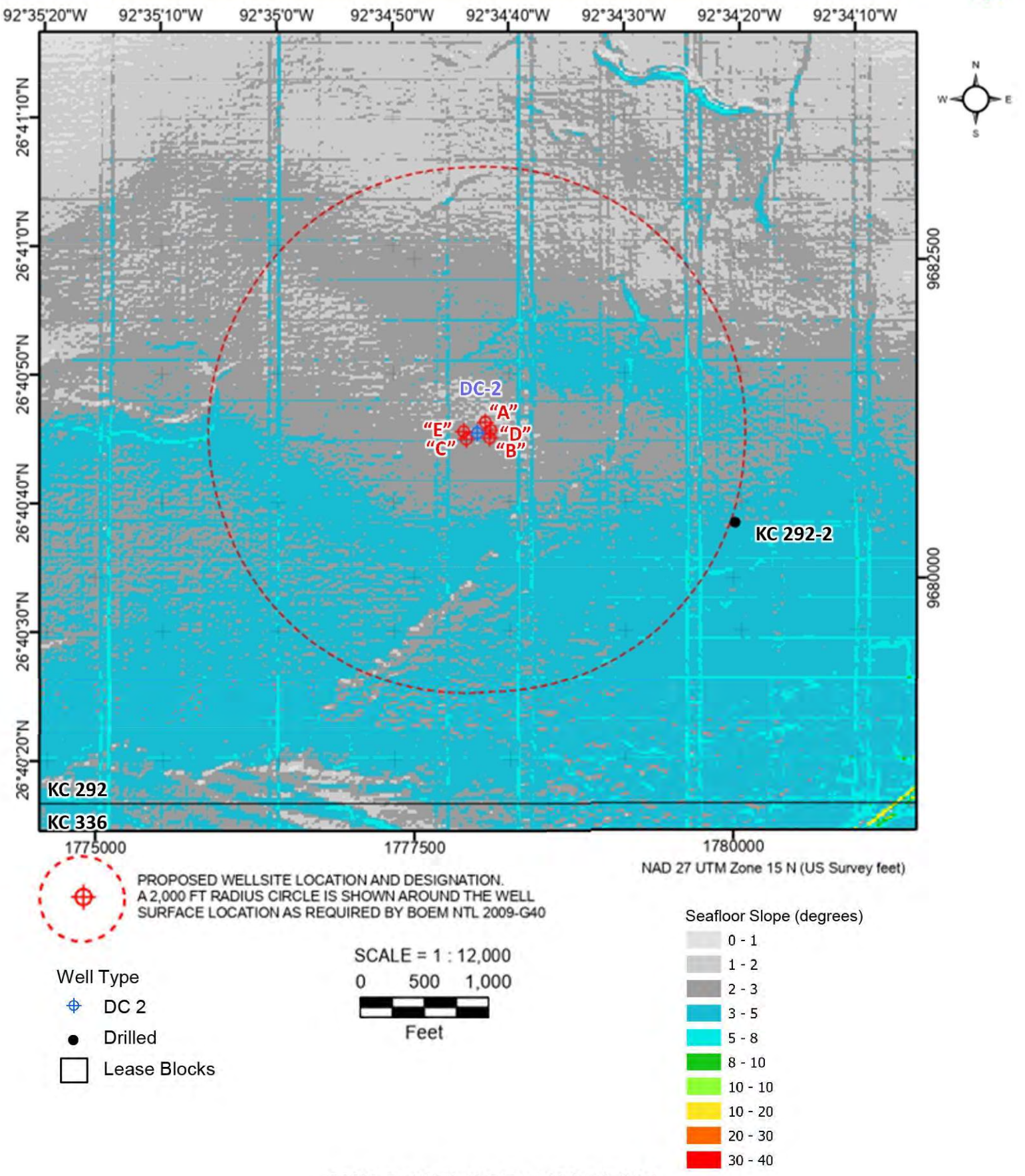
- MTD Erosion
- MTD accumulation
- Shallow faults

Water Depth (ft MSL)
-5845 ft
-6187 ft

MSL = Mean Sea Level

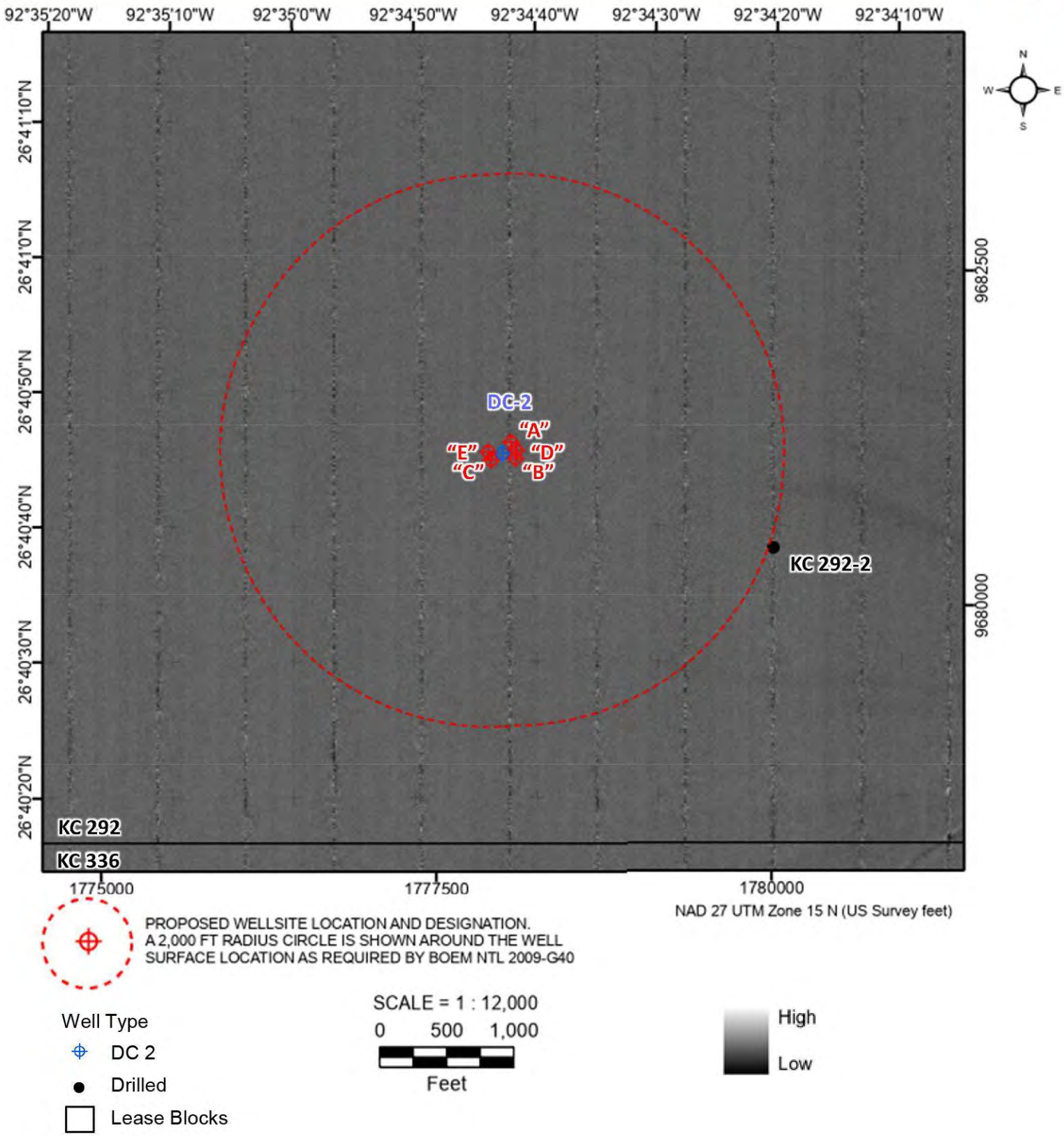
AUV WATER DEPTH AND SEAFLOOR FEATURES
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D", "D" AND "E"

BP AMERICA INC.
SITE CLEARANCE LETTER, PROPOSED "A", "B", "C", "D" AND "E" LOCATIONS, BLOCK 292, KEATHLEY CANYON, GULF OF MEXICO

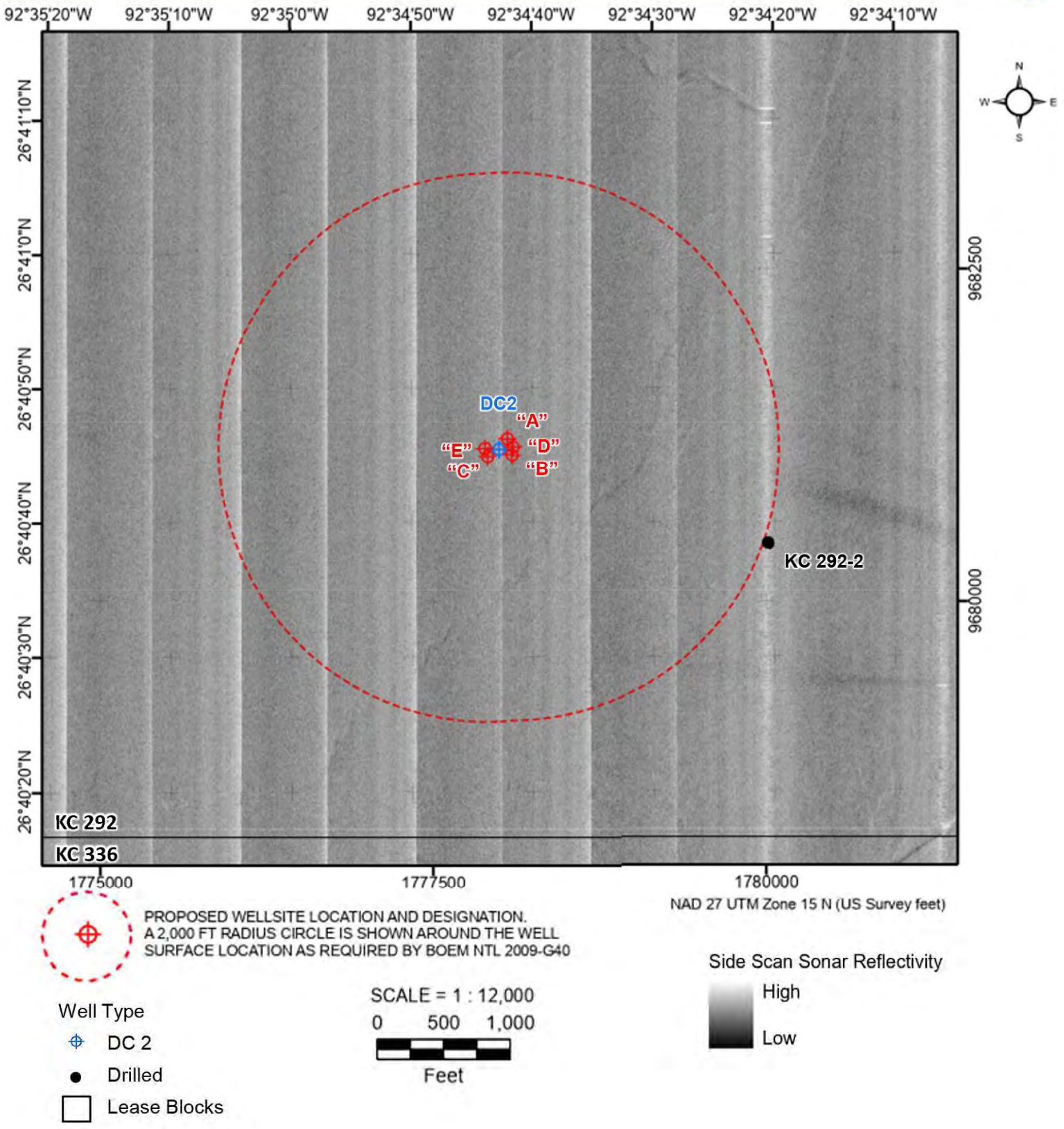


AUV SEAFLOOR GRADIENT
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D" AND "E"

BP AMERICA INC.
SITE CLEARANCE LETTER, PROPOSED "A", "B", "C", "D" AND "E" LOCATIONS, BLOCK 292, KEATHLEY CANYON, GULF OF MEXICO

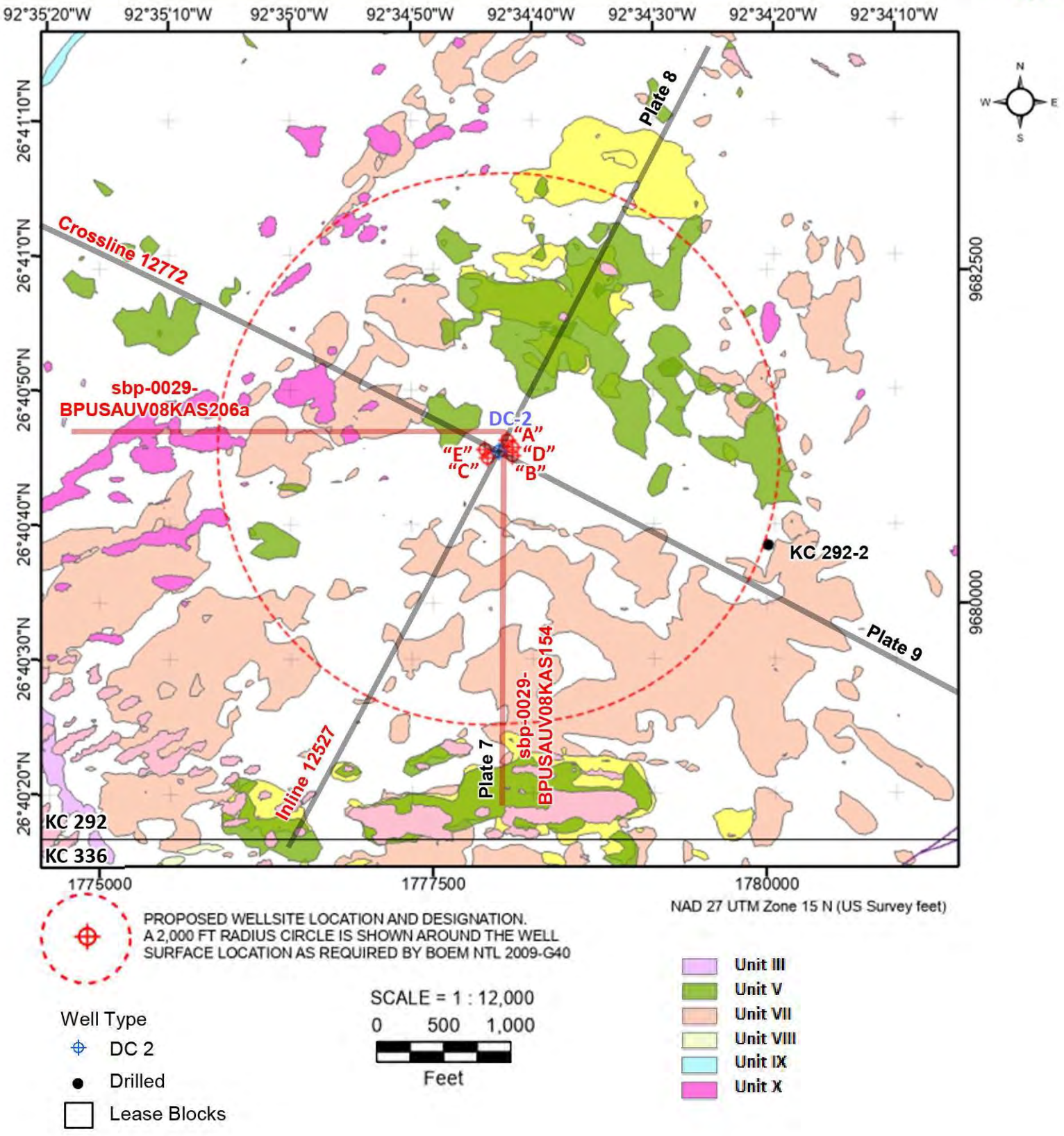


AUV MULTIBEAM BACKSCATTER
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D" AND "E"

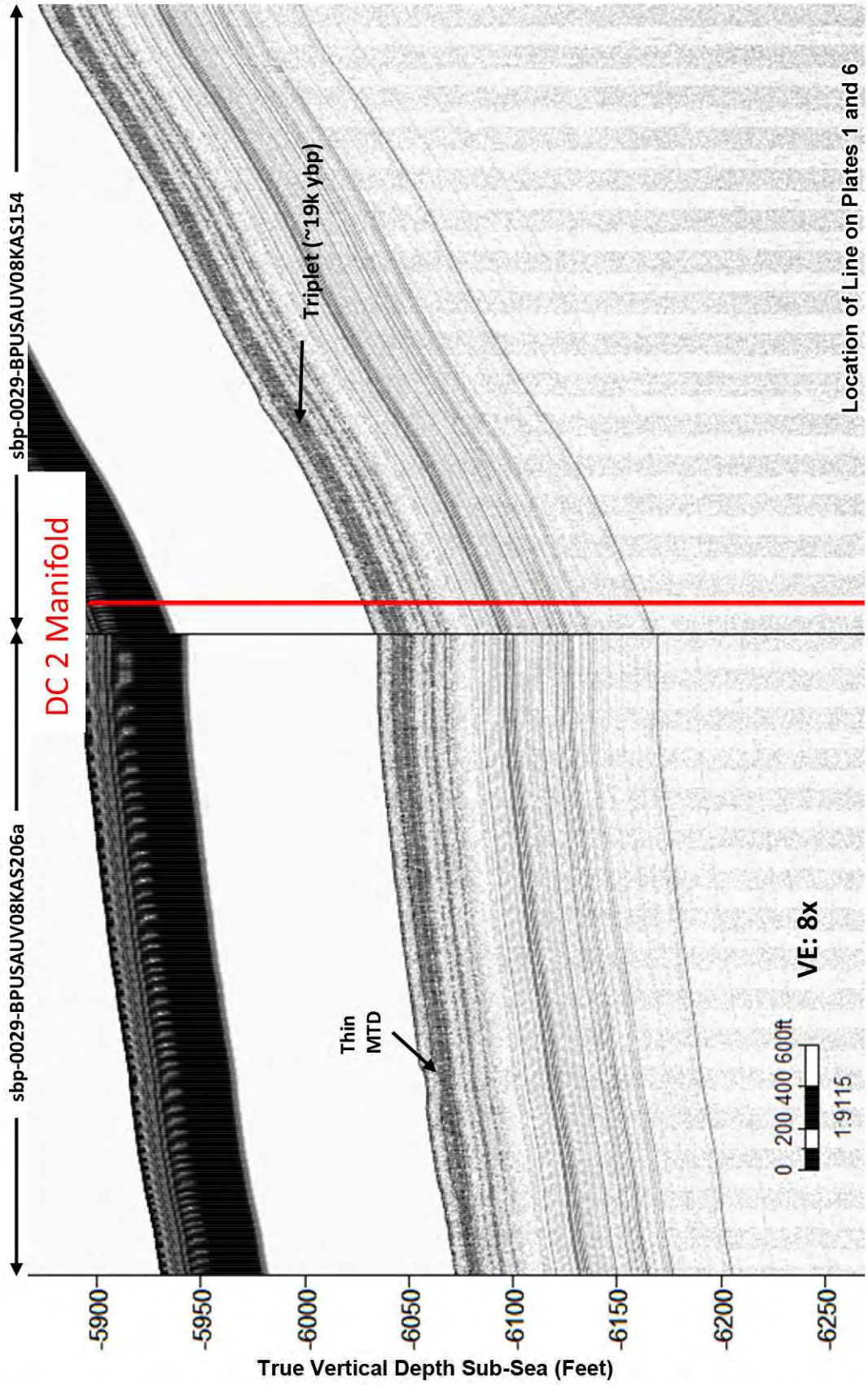


AUV SIDE SCAN SONAR MOSAIC
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D" AND "E"

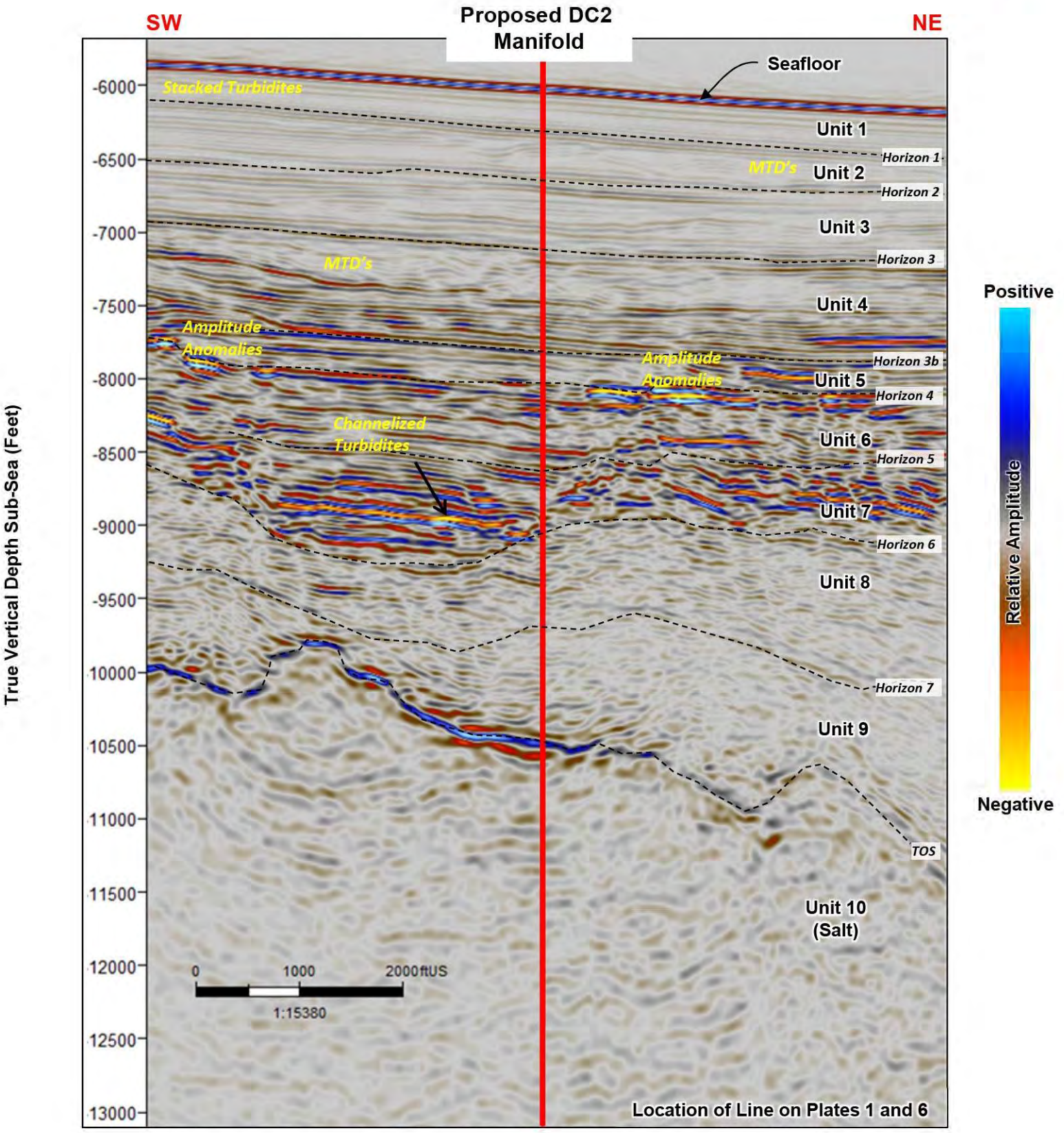
BP AMERICA INC.
SITE CLEARANCE LETTER, "A", "B", "C", "D" AND "E" LOCATIONS, BLOCK 292,
KEATHLEY CANYON, GULF OF MEXICO



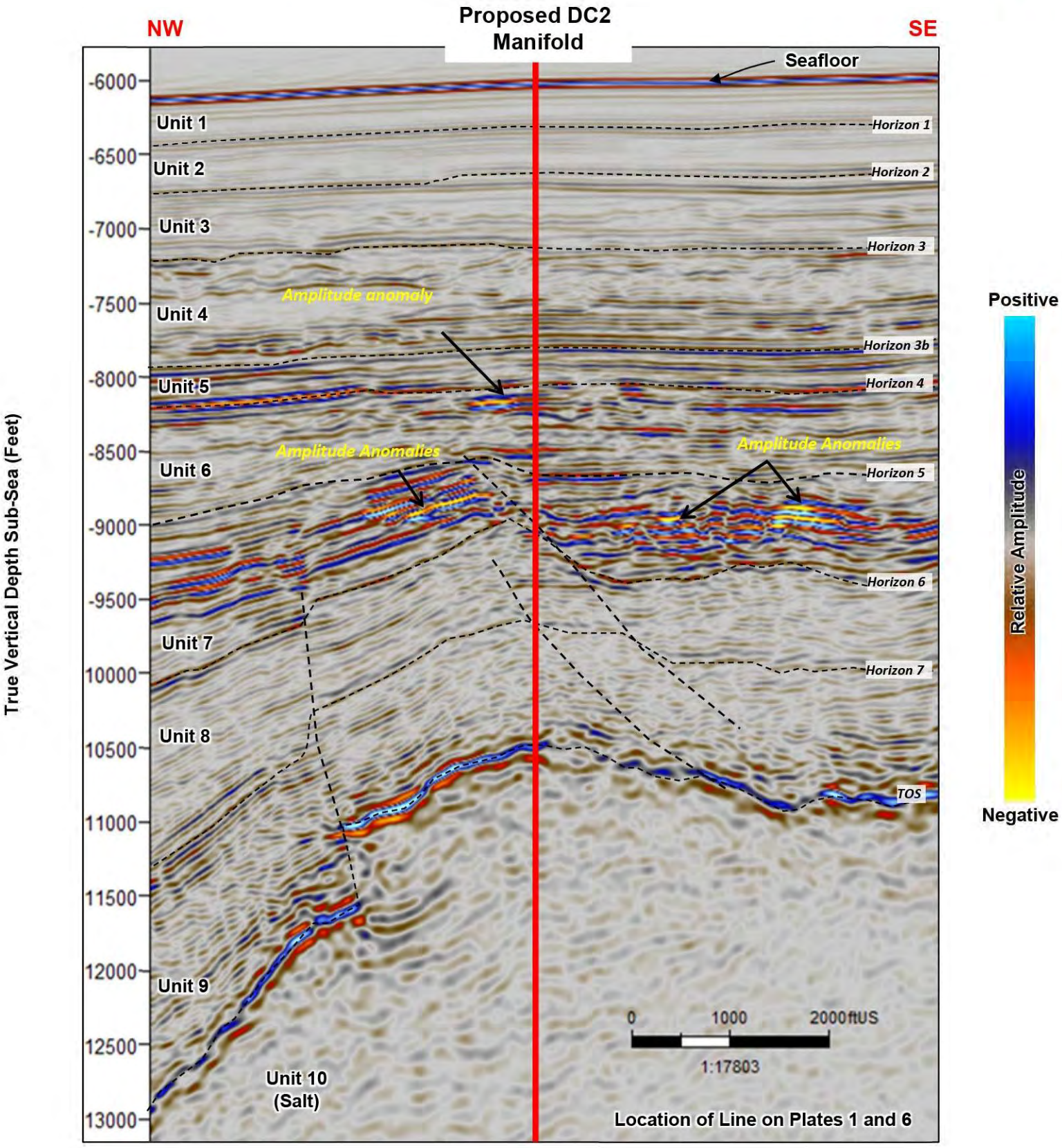
SUB-SURFACE GEOLOGIC FEATURES
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D" AND "E"



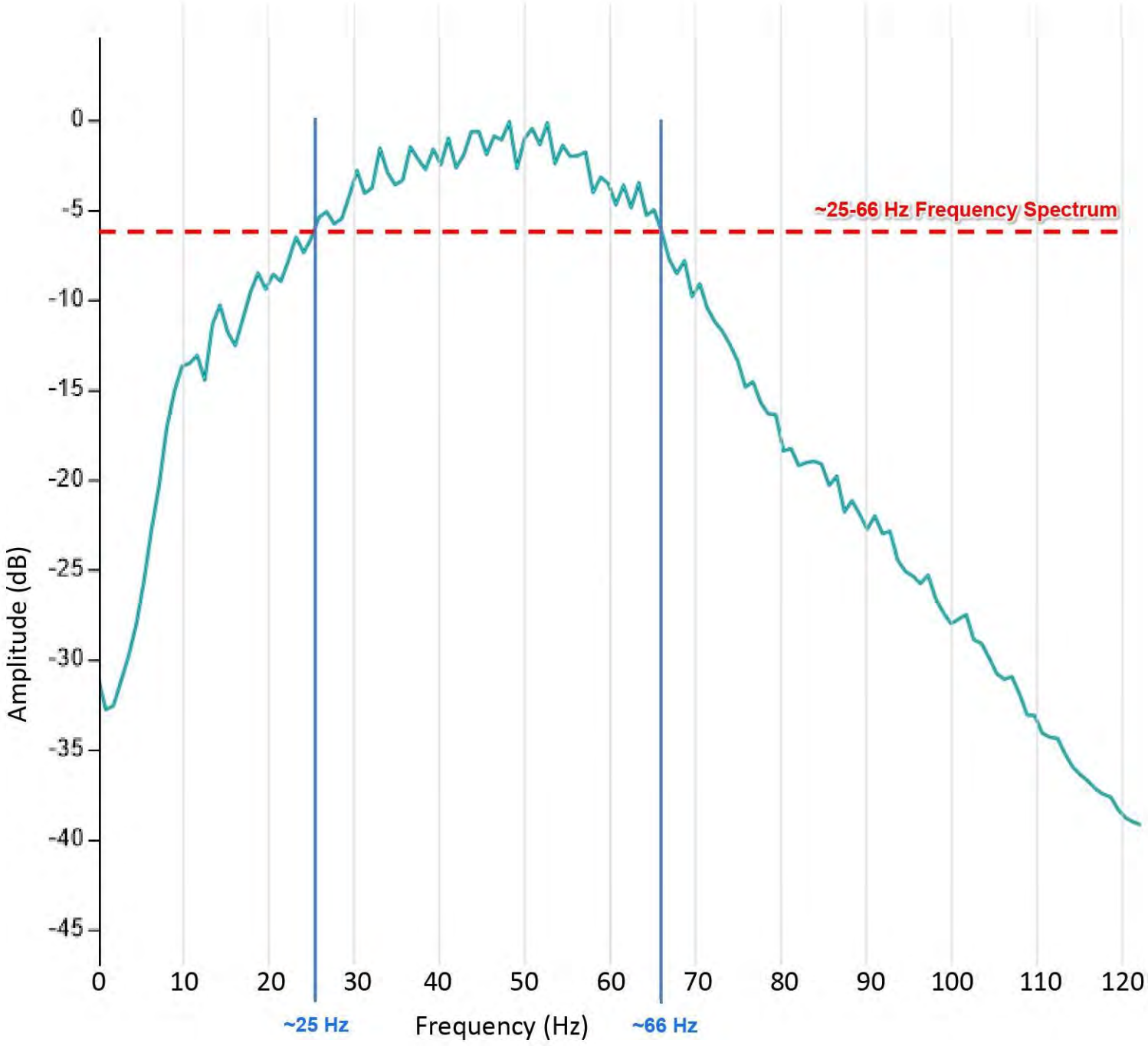
PORTION OF AUV COMPOSITE SUBBOTTOM LINES sbp-0029-BPUSAUV08KAS206a AND sbp-0029-BPUSAUV08KAS154
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D" AND "E"



3D SEISMIC SECTION, PORTION OF INLINE 12751, KASKIDA, BLOCK 292, KEATHLEY CANYON AREA PROPOSED WELLSITES "A", "B", "C", "D" AND "E"

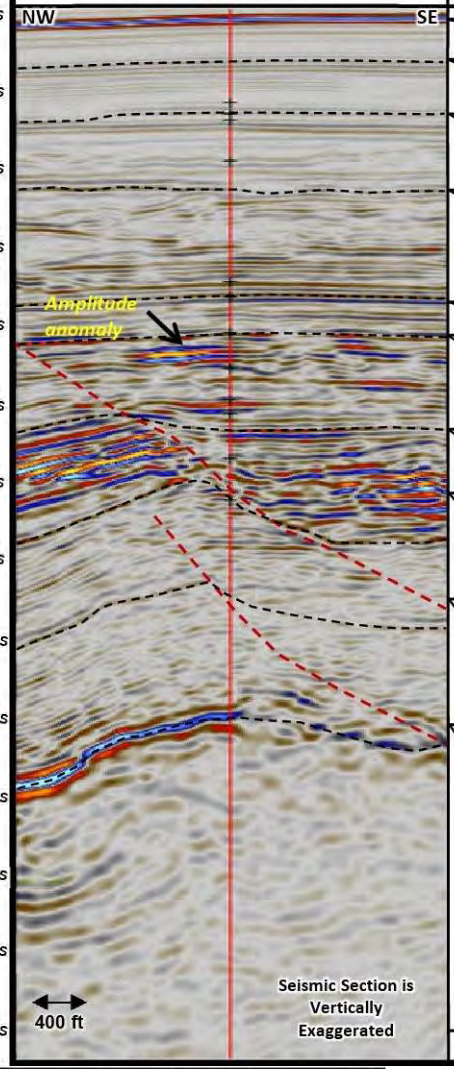


3D SEISMIC SECTION, PORTION OF CROSSLINE 12666, KASKIDA, BLOCK 292, KEATHLEY CANYON AREA PROPOSED WELLSITES "A", "B", "C", "D" AND "E"



3D SEISMIC FREQUENCY SPECTRUM,
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED WELLSITES "A", "B", "C", "D" AND "E"

BP AMERICA INC.
SITE CLEARANCE LETTER, PROPOSED DRILL CENTER 2 KC 292 "A", "B", "C", "D", and "E"
KEATHLEY CANYON, GULF OF MEXICO



Horizon & Unit	Inferred Lithology & Top-hole Conditions	DEPTHS BML (Feet)	DEPTHS TVDSS (Feet)	THICKNESS (Feet)	SHALLOW GAS POTENTIAL	SHALLOW OIL POTENTIAL	SHALLOW WATER FLOW POTENTIAL
Seafloor	*Seafloor slopes ~2° to the north*	0	6,025				
Horizon 1 (Unit 1)	*Soft to very stiff clays underlain by laminated clays and silty clays.*	275	6,300	275	Negligible	Negligible	Negligible
Horizon 2 (Unit 2)	*Debris flows and channelized turbidites. Clays/silts.* *Channelized interval with silts and sands*	600	6,625	325	Negligible	Negligible	Negligible
Horizon 3 (Unit 3)	*Sand prone channelized turbidite with thin silts and mass transport deposits. Clays with silt to sandy intervals.*	1,095	7,120	495	Negligible	Negligible	Negligible
BGHS Horizon S (Unit 4)	*Mass transport deposits. Clay, silt, & thin sands possible.* *Alternating channelized sand and silt intervals.* *Predicted base of gas hydrate stability*	1,738	7,761	685	Negligible	Negligible	Negligible / Moderate
Horizon 4 (Unit 5)	*Channelized turbidites and mass transport deposits. Silty to sandy intervals.*	1,780	7,805	222	Negligible	Negligible	Negligible
Horizon 5 (Unit 6)	*Channelized turbidites and mass transport deposits. Clay, silt, & sand*	2,002	8,027	635	Low / Negligible	Negligible	Low / Negligible / Low
Fault 1 Horizon 6	*Mass transport deposits and slumped turbidites. Clay, silt, & sand*	2,637	8,662	443	Negligible	Negligible	Negligible / Low
Horizon 7 Fault 2 (Unit 7)	*Slumped and channelized turbidites. Mass transport deposits. Clays and silts, possibly sand.* *Channelized turbidites and thin mass transport sediments. Clay, silt, and sand.*	2,985 / 3,080	9,010 / 9,105	622	Negligible	Negligible	Negligible
(Unit 8)	*Mass transport deposits and slumped turbidites.* *Clay with thin sands and silts possible.*	3,702	9,727	763	Negligible	Negligible / Low	Negligible
Top of Salt (Unit 9)	*Turbidites and mass transport deposits. Clay with silty to sandy intervals.* *Clays, silts and sands.*	3,747	9,772				
	Interpreted clean allochthonous Salt.	4,465	10,490	2,035	Negligible	Negligible	Negligible
(Depth Limit of Investigation)		6,500	12,525				
			Risk Scale		Negligible	Low	Moderate / High

Surface Locations at
"A": X = 1,778,060.78 ft , Y = 9,681,231.78 ft ;
"B": X = 1,778,094.29 ft , Y = 9,681,110.06 ft ;
"C": X = 1,777,910.87 ft , Y = 9,681,099.40 ft ;
"D": X = 1,778,099.79 ft , Y = 9,681,172.82 ft ;
"E": X = 1,777,898.26 ft , Y = 9,681,161.21 ft ;

UTM Zone 15 N (US ft) Geodetic Datum: NAD 1927

- *Note depths and horizons are relative to well location.*
- *MTD = Mass Transport Deposits*

BML = Below Mudline
BGHS = Base of Gas Hydrate Stability
TVDSS = True Vertical Depth Subsea

TOP-HOLE PROGNOSIS CHART,
KASKIDA, BLOCK 292, KEATHLEY CANYON AREA
PROPOSED DRILL CENTER 2 KC 292 "A", "B", "C", "D", and "E"

Plate 11

GEOSCIENCE EARTH & MARINE SERVICES, INC.
A Geosyntec Company

15810 Park Ten Place, Suite 100
Houston, Texas 77084
www.gemsinc.com

September 4, 2024

Project No.: GHZ3279

BP America Inc.
501 Westlake Park
Houston, TX 77079

Attention: Mr. Jason Bronikowski

Shallow Geohazards Assessment
Proposed Kaskida Mooring Anchor Pile Locations
Blocks 292, 293, 336, and 337
Keathley Canyon Area, Gulf of Mexico

BP America Inc., (BP) requested for Geoscience Earth & Marine Services (GEMS) to provide the following shallow geohazards assessment of the proposed Kaskida Floating Production Unit (FPU) mooring anchor pile locations in Blocks 292, 293, 336, and 337 Keathley Canyon (KC) Area, Gulf of Mexico (Figures 1 and 2).

This report complies with the current Bureau of Ocean Energy Management (BOEM) Notices-to-Lessees (NTLs). The applicable NTLs present guidelines for filing exploration and development plans (NTL 2008-G04; MMS 2008), archaeological assessment (NTL 2005-G07; BOEM 2020), geohazard assessments (NTL 2022-G01; BOEM, 2022), and the delineation of potential areas of high-density deepwater benthic communities (NTL 2009-G40; MMS, 2010).

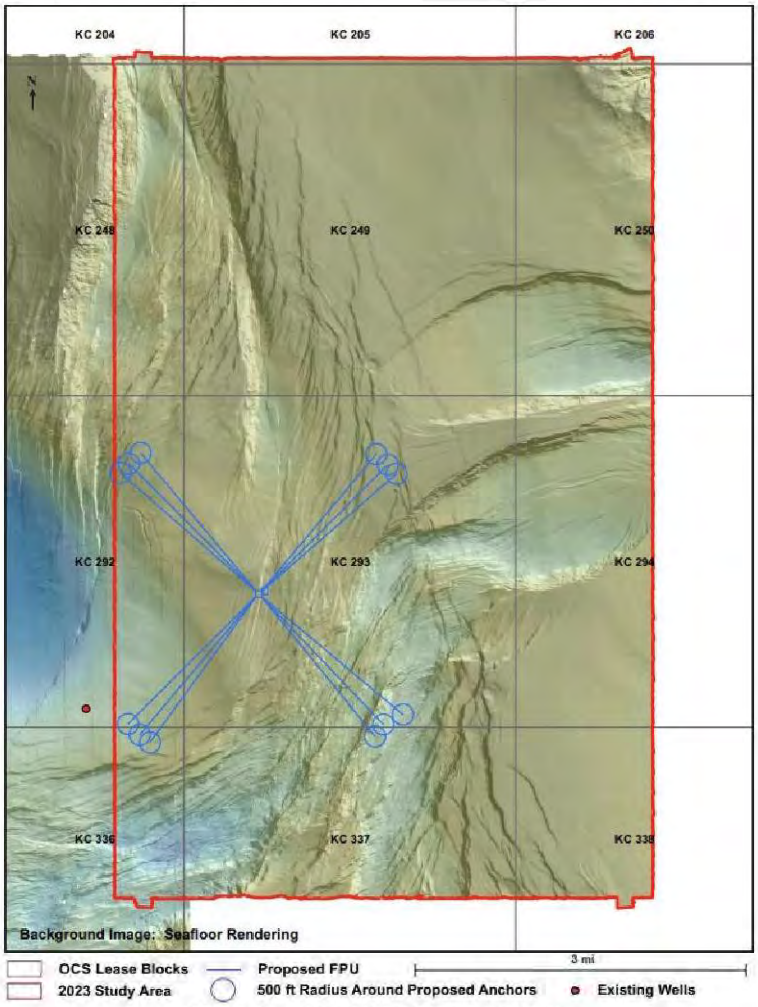


Figure 1. Survey Area Overview Map.