

FINDING OF NO SIGNIFICANT IMPACT

Peoples Energy Production – Texas, LP
Proposal to Directionally Drill and Produce the
Vastar Unit 2A No. 2 Well
from a Surface Location Outside the
Beaumont Unit
Big Thicket National Preserve
Hardin and Orange Counties, Texas

INTRODUCTION

On June 7, 2005, Peoples Energy Production (Peoples) submitted to the National Park Service (NPS) an application to directionally drill and produce the Vastar Unit 2-A No. 2 Well from a surface location outside the Beaumont Unit (Unit) of Big Thicket National Preserve (Preserve) to a bottomhole target beneath the Unit. On August 16, 2005, the Superintendent determined that the application was substantially complete, and the NPS proceeded with its formal review.

The regulations found at 36 C.F.R. Part 9, Subpart B (9B regulations) “control all activities within any unit of the National Park System in the exercise of rights to oil and gas not owned by the United States where access is on, across or through federally owned or controlled lands or waters.” *Id.* at subsection 9.30(a). Subsection 9.32(e) governs operators proposing to develop their nonfederal oil and gas rights in any unit of the National Park System by “using directional drilling techniques which result in the drill hole crossing into the unit and passing under any land or water the surface of which is owned by the United States.” Under subsection 9.32(e), an operator may obtain an exemption from the 9B regulations if the NPS Regional Director is able to determine from available data that the proposed operations “pose no significant threat of damage to park resources, both surface and subsurface, resulting from surface subsidence, fracture of geological formations with resultant fresh water aquifer [sic] contamination, or natural gas escape, or the like.” Based on the information contained in Peoples’ application and other available data, the NPS has determined that Peoples’ proposal qualifies for a regulatory exemption under subsection 9.32(e).

For purposes of public disclosure and education, NPS prepares NEPA documents on all directional drilling proposals submitted to the NPS. Through its NEPA analysis, the NPS assesses impacts both in and outside of the park associated with the downhole operations in addition to the connected actions outside of the park. The downhole activities occurring in the park are analyzed to determine if there is a significant threat to park resources and if a § 9.32(e) exemption should be granted. As required by NEPA, the analysis of the impacts from the connected actions occurring outside of the park are presented in addition to the downhole operations both inside and outside of the park to disclose to the public all of the potential impacts on the human environment.

Cumulative impacts are presented for the analysis area which includes areas inside and outside of the park.

Congress established the Preserve with the Act of October 11, 1974, Pub. L. No. 93-439, 88 Stat. 1254, codified as amended at 16 U.S.C. §§ 698-698e (2000), as the nation's first preserve, "[i]n order to assure the preservation, conservation, and protection of the natural, scenic, and recreational values of a significant portion of the Big Thicket area in the State of Texas and to provide for the enhancement and public enjoyment thereof." The authorizing legislation directs the Secretary of the Interior to administer the lands within the Preserve "in a manner which will assure their natural and ecological integrity in perpetuity." The Preserve comprises 15 separate units, totaling 97,205 acres. After the Preserve's establishment, the United States began acquiring lands within the Preserve's authorized boundaries. Private entities retained ownership of the mineral estate underlying their lands, however, the State of Texas retained ownership of the mineral estate underlying the Neches River and navigable reaches of Pine Island Bayou. Thus, the United States does not own any of the mineral estate underlying the Preserve; yet Congress has charged the NPS with protecting the Preserve from any actions, including oil and gas operations, that may adversely impact the Preserve's resources and values.

PREFERRED ALTERNATIVE

The NPS has decided to implement Alternative B (Preferred Alternative or Proposed Action), as described by Peoples in its application. Under Alternative B, the NPS would issue a § 9.32(e) regulatory exemption for Peoples to directionally drill and produce the Vastar Unit 2-A No. 2 Well from a surface location outside the Beaumont Unit of Big Thicket National Preserve to a bottomhole target beneath the Unit.

Alternative B allows Peoples to access and develop its legally recognized and protected oil and gas interests; at the same time, through the application of mitigation measures developed by Peoples during the scoping and planning processes, it ensures the protection of park resources and values. In-park operations may commence immediately after the exemption from the NPS is obtained.

Access: Peoples will directionally drill the well beneath the Unit from a surface location approximately 700 feet southeast of the Unit boundary. No surface access to the Unit will be needed for any phase of the proposed operation. Outside the Unit, access will be provided through the use of an existing Farm-to-Market road and a portion of Four Oaks Ranch Road. No improvements to the roads will be needed.

Drilling: The well will be drilled to a true vertical depth of approximately 10,440 feet with a measured depth of approximately 11,600 feet. The operations inside the Preserve will consist of directionally drilling a 7-5/8-inch hole that will enter the Beaumont Unit at a point approximately 4,030 feet below ground level and continue to the targeted total depth. The wellbore would cross into the Unit substantially below the depth that usable quality ground water occurs in the area (from the surface to 1,325 feet), or that superior

water quality occurs (from the surface to 750 feet). There is no threat to park resources or values from the proposed subsurface operations in the Unit; therefore, Peoples' directional well qualifies for an exemption with no mitigation.

Peoples is expected to comply with all provisions of the Railroad Commission of Texas' statewide oil and gas rules to drill and eventually plug the well to ensure the protection of usable-quality water zones, as well as comply with a Spill Control and Countermeasures (SPCC) Plan for the drilling rig. Drilling and completion operations should take approximately 40 days. If the well is found to be a dry hole, plugging and abandonment activities should be completed in approximately the same period of time.

The wellpad will measure approximately 200 feet x 762 feet or 3.5 acres. Only 0.5 acres of the drillsite will be cleared of vegetation, as the remaining three acres is already cleared. All drilling fluids and cuttings will be contained in aboveground tanks as part of a closed-loop system. Construction of the wellpad will not require fill into waters of the U.S., and therefore will not require a Section 404 permit from the U.S. Army Corps of Engineers.

Flowline: In the event that salable quantities of gas are discovered, existing flowlines in the established production pad will be used. Depending on capacity of the existing flowlines, a 4- to 6-inch diameter flowline will be constructed within the proposed pad location to transport product from the Vastar Unit 2-A No. 2 Well to an existing pipeline. The flowline will be trenched and installed at a minimum depth of 3 feet below the surface of the pad/production area.

Production Facility: If salable quantities of oil and gas are discovered and the proposed well is completed as a producer of those fluids, production facilities will be constructed within the area utilized to drill the well. Equipment onsite will include the wellhead, separation and treating vessels, line heaters, dehydrators, water and condensate storage tanks, a series of flowlines connecting the various components of the production equipment and sales lines and meter. The tank battery, separators, and other production facility installations will be provided with a means of secondary containment for the entire capacity of the largest single container and with sufficient freeboard to contain precipitation. The facility will be developed and maintained according to Peoples' SPCC Plan and 40 CFR 112.7.

Reclamation Plan: If the well is nonproductive, the drill site will be reclaimed in accordance with RRC Statewide Rule 8. Upon abandonment of a production facility, all equipment and related materials will be removed from the site, the well plugged in accordance with RRC Statewide Rules 13 and 14, and the area will be restored to address safety concerns, but be maintained as the site may be used at a later time to re-enter the drilling unit.

Mitigation Measures: As stated above under the heading “Drilling,” Peoples’ directional drilling proposal qualifies for a § 9.32(e) exemption with no mitigation; therefore, the § 9.32(e) determination is not based upon those mitigation measures Peoples voluntarily included in its application. However, the NPS evaluated the potential impacts from the connected actions and cumulative actions with consideration of the voluntary mitigation measures included in Peoples’ application in the EA. These mitigation measures, enumerated in Peoples’ application and listed in the EA, are attached to this FONSI as Table 1.

ALTERNATIVES CONSIDERED

In addition to the Preferred Alternative (Alternative B/Proposed Action), the EA considered the No Action Alternative (Alternative A). Analysis of the No Action Alternative is required under NEPA to establish a baseline against which to compare the environmental consequences of the proposed action. Two alternatives were considered but dismissed from further analysis in the EA because they did not meet the project objectives as well as the alternatives being evaluated in detail. These included NPS acquisition of the mineral rights that are a part of Peoples’ directional drilling proposal; and drilling from a surface location inside the Unit.

ENVIRONMENTALLY PREFERRED ALTERNATIVE

Alternative A, No Action, is the environmentally preferred alternative. The environmentally preferred alternative is the alternative that best meets the national environmental policy expressed in Section 101 of the National Environmental Policy Act:

- fulfill the responsibilities of each generation as trustee of the environment for succeeding generations;
- assure for all generations safe, healthful, productive, and aesthetically and culturally pleasing surroundings;
- attain the widest range of beneficial uses of the environment without degradation, risk of health or safety, or other undesirable and unintended consequences;
- preserve important historic, cultural and natural aspects of our national heritage and maintain, wherever possible, an environment that supports diversity and variety of individual choice;
- achieve a balance between populations and resource use that will permit high standards of living and a wide sharing of life’s amenities; and
- enhance the quality of renewable resources and approach the maximum attainable recycling of depletable resources.

Under Alternative A, No Action, the well would not be directionally drilled and produced, providing the greatest protection of the area outside of the Preserve, and resources and values inside the Beaumont Unit. However, the alternative did not meet the criteria of recognizing the private owners’ right to access their mineral interest underlying the Preserve. Consequently, the environmentally preferred alternative was not selected as the NPS’s preferred alternative.

The proposal, Alternative B, was selected for implementation over the environmentally preferred alternative. The NPS preferred alternative is Alternative B, Proposed Action, because Peoples holds a valid oil and gas lease right which, if developed, will not result in an impairment of park resources and values. This alternative would fulfill park protection mandates while recognizing Peoples' right to exercise its mineral interest. After consideration of public and agency comments throughout the scoping and planning process, careful review of potential resources and visitor impacts and review of the mitigation measures proposed by Peoples to protect resources, NPS determined that the preferred alternative best strikes a balance between resource protection and recognizing private minerals underlying this unit of Big Thicket National Preserve.

WHY THE PREFERRED ALTERNATIVE WILL NOT HAVE A SIGNIFICANT EFFECT ON THE HUMAN ENVIRONMENT

As defined in 40 CFR § 1508.27, significance is determined by examining the following criteria:

Impacts that may be both beneficial and adverse

Some resources and concerns analyzed were dismissed from further analysis in the EA because either the resource is not found in the analysis area; there would be no effect from the proposal; or through the application of mitigation measures, there would be minor or less effects, including cumulative effects from the proposal, and there is little controversy on the subject or reason to otherwise include the topic.

Resources and concerns dismissed include: Socioeconomics; Environmental Justice; Prime and Unique Farmland Soils in and outside the Unit; Water Resources: Groundwater and Streamflow Characteristics in and outside the Unit; Species of Management Concern in and outside the Unit; Other Unit Resources and Values: Geology and Soils, Vegetation, Fish and Wildlife, Cultural Resources, Visitor Use and Experience.

Through the scoping process, the interdisciplinary team decided to carry the following topics through the EA for analysis:

Air Quality in and outside the Unit. Access road use, construction of the well/production pad and flowlines; drilling and producing the well; any workover operations on the well; and eventual plugging/abandonment/reclamation would result in short- to long-term, localized to widespread, negligible to moderate, adverse impacts to air quality both in and outside the Unit.

Natural Soundscapes in and outside the Unit. Access road use, construction of the well/production pad and flowlines; drilling and producing the well; any workover operations on the well; and eventual plugging/abandonment/reclamation would result

in short- to long-term, localized, negligible to moderate, adverse impacts to natural soundscapes both in and outside the Unit.

Lightscape Management in and outside the Unit. Access road use, construction of the well/production pad and flowlines; drilling and producing the well; any workover operations on the well; and eventual plugging/abandonment/reclamation would result in short- to long-term, localized to widespread, negligible to moderate, adverse impacts to the lightscape both in and outside the Unit.

Water Resources: Floodplains and Wetlands in and outside the Unit. Access road use, construction of the well/production pad and flowlines; drilling and producing the well; any workover operations on the well; and eventual plugging/abandonment/reclamation would result in short- to long-term, localized to widespread, negligible to moderate, adverse impacts to floodplains and wetlands both in and outside the Unit.

Adjacent Landowners, Resources and Uses. Access road use, construction of the well/production pad and flowlines; drilling and producing the well; any workover operations on the well; and eventual plugging/abandonment/reclamation would result in short- to long-term, localized, negligible to moderate, adverse impacts on cultural resources, vegetation, and geology and soils; and short- to long-term, localized to widespread, negligible to moderate, beneficial as well as adverse impacts on wildlife on lands adjacent to the Unit.

Degree of effect on public or health and safety

There would be negligible to minor effects on visitor use or experience within the Unit from noise disturbance, emissions, and artificial lighting from the connected actions associated with the project. Mitigation measures, including complying with the Statewide Rules for drilling, casing, and completing the well, and for eventual plugging and abandonment; preparing and complying with the SPCC Plan; and using a containerized mud system would minimize potential effects on public health or safety in the vicinity of the well and flowlines outside the Unit.

Unique characteristics of the geographic area such as proximity to historic or cultural resources, park lands, prime farmlands, wetlands, wild and scenic rivers, or ecologically critical areas

As described in the EA, there is the possibility that during directional drilling and production of the well, stormwater could transport sediment and any accidentally released contaminants to adjacent wetlands, resulting in short- to long-term, localized to widespread, negligible to moderate, adverse impacts. Approximately 0.5 acres of prime farmland soils outside the Unit would be converted from timber production to oil and gas use for the life of the well. However, this project is not a federal action. As such, the Farmland Protection Policy Act does not apply. No wild and scenic rivers or ecologically critical areas would be affected, because they are not in the analysis area. Please see the discussion below regarding historic or cultural resources.

Degree to which effects on the quality of the human environment are likely to be highly controversial

The Sierra Club has expressed concerns about the project. However, the NPS has performed a thorough analysis and has determined that implementation of the selected alternative would not cause any significant impacts on the human environment; therefore, there are no highly controversial environmental effects about the project.

Degree to which the possible effects on the quality of the human environment are highly uncertain or involve unique or unknown risks

There were no highly uncertain effects, or unique or unknown risks identified with this proposal.

Degree to which the action may establish a precedent for future actions with significant effects or represents a decision in principle about a future consideration:

If the Peoples well is successful, it may prompt additional oil and gas drilling to develop mineral interests under the Unit and adjacent areas. However, the NPS will evaluate each proposal to drill beneath the Unit as it is submitted; will consider the cumulative impacts of each proposal; and, before approving any proposal, will apply appropriate mitigation measures to reduce or avoid any significant effects. In the case where the NPS lacks the regulatory authority to require mitigation measures, it will work with applicants, and other State and Federal agencies that may have a role in permitting some aspect of the proposal, to consider and apply appropriate mitigation measures to the proposal. The NPS has considered the cumulative effects of future oil and gas activity in the EA.

Whether the action is related to other actions with individually insignificant but cumulatively significant impacts

Oil and gas exploration and development will continue within and adjacent to Big Thicket National Preserve regardless of whether NPS issues the 9.32(e) exemption to Peoples. Adherence to Federal, State, and local laws and regulations, and voluntary mitigation measures by oil and gas operators would reduce potential cumulative impacts below the threshold of significance.

Degree to which the action may adversely affect districts, sites, highways, structures, or objects listed on National Register of Historic Places or may cause loss or destruction of significant scientific, cultural, or historical resources

The NPS has no Section 106 responsibility with respect to the National Historic Preservation Act of 1966, as amended, for wells that originate on non-federal lands located outside the Unit for which the wellbores would cross through the Unit to extract non-federally owned hydrocarbons from beneath the Unit. The Advisory Council on Historic Preservation concurred with this finding on September 13, 2004.

Degree to which the action may adversely affect an endangered or threatened species or its critical habitat

The NPS did not formally consult with either the US Fish and Wildlife Service (FWS) or the Texas Parks and Wildlife Department (TPWD) regarding this proposal. The FWS was informed of the project by mail in the form of a scoping brochure. FWS was also sent a copy of the EA. Current lists of threatened and endangered species for the counties affected were procured from the FWS website and from Ms. Dorinda Scott of the TPWD. NPS determines the directional drilling and production of the Vastar Unit 2-A No. 2 Well would have no effect on federally-listed threatened and endangered species or their habitat in or outside the Unit. Nor would there be an effect on any state-listed species within the Unit from the in-park or connected actions associated with the proposal. This determination is based upon a combination of factors. First, the habitat in the project area is not suitable for the species identified by U.S. Fish and Wildlife Service (e.g., red-cockaded woodpecker, Texas trailing phlox, and bald eagle). Second the directionally drilled wellbore would cross the Unit boundary at a depth that precludes any effect on surface resources. And third, Peoples has designed mitigation measures into the project. This no effect determination negates the need to prepare a Biological Assessment.

Whether the action threatens a violation of Federal, State, or local environmental protection law

The proposal has been developed to comply with all regulatory requirements. Further, the proposal is consistent with the 1980 Big Thicket National Preserve General Management Plan.

IMPAIRMENT

In addition to reviewing the definition of “significantly” under the NEPA regulations, the NPS has determined that implementation of the preferred alternative would not constitute an impairment to the integrity of Big Thicket National Preserve resources or values as described by NPS Management Policies NPS 2001, §1.4. This conclusion is based on the NPS’s analysis of the environmental impacts of the proposed action as described in the EA; and on the Superintendent’s professional judgment, as guided and informed by the Big Thicket National Preserve General Management Plan (1980), and the regulations found at 36 C.F.R. Part 9, Subpart B.

PUBLIC INVOLVEMENT

Public and internal scoping was conducted for this EA as required by NPS policy (Director’s Order-12) and NEPA. A public scoping brochure announcing a 15-day public scoping period was sent to the Preserve’s mailing list on June 8, 2005, and posted on the Preserve’s website. Scoping included identifying major issues to address in the EA, obtaining additional information on the development of reasonable alternatives, and identifying measures for mitigating environmental impacts.

The NPS made the EA available for public review and comment during a 30-day period from August 30 until September 29, 2005. The document was made available directly to the Preserve's mailing list, and was also posted to the NPS Planning, Environment, and Public Comment (PEPC) website. The following State and Federal agencies were sent copies of the EA for review: Railroad Commission of Texas, District 3; U.S. Army Corps of Engineers; and U.S. Fish and Wildlife Service. Also, copies of the EA were sent to the Alabama-Coushatta Tribe of Texas, the Big Thicket Association, Davis Brothers, the Sierra Club Regional Director in Austin, the Houston Regional Group of the Sierra Club, the Associate Regional Representative of the Sierra Club, and the Texas Committee on Natural Resources. An individual from Beaumont, Texas requested and received a copy of the EA as well. The EA was also posted on the Preserve's website, as well as the NPS's Planning, Environment and Public Comment (PEPC) website.

One response was received from the Sierra Club, Houston Region (Lone Star Chapter), from which the NPS determined there were 39 substantive comments. Responses to these substantive comments are attached. These concerns resulted in one change to the text of the environmental assessment (see attached errata sheet). The FONSI will be sent to those who provided substantive comments, or have requested a copy.

CONCLUSION

The preferred alternative does not constitute an action that normally requires preparation of environmental impact statement (EIS). Implementation of the preferred alternative would not have significant effect on the human environment. Environmental impacts that could occur are localized to widespread, short- to long-term, negligible to moderate, and generally adverse. There are no unmitigated adverse impacts to public health; public safety; threatened or endangered species; historical sites or districts listed, or eligible for listing, in the National Register of Historic Places; known ethnographic resources; or other unique characteristics of the region. No highly uncertain or controversial impacts, unique or unknown risks, major cumulative effects, or elements of precedence were identified. Implementation of the action would not violate any Federal, State, or local environmental protection law.

Based on the foregoing, it has been determined that the project does not constitute a major Federal action significantly affecting the quality of the human environment and that an EIS is not required for this project and thus will not be prepared.

This FONSI is valid for two years from the date of approval unless new information warrants a revision of the FONSI prior to the expiration date.

Approved: Michael D. Snyder
Michael D. Snyder
Acting Director, Intermountain Region

11/10/05
Date

Table 1, Voluntary Mitigation Measures included in Peoples' Application

No.	Mitigation Measures-Proposed Action (Alternative B)	Resource(s) Protected
1	Peoples has included a Spill Prevention Control and Countermeasure (SPCC) Plan with their application.	all resources, and human health and safety
2	Peoples has sited all surface activities, including the access road, flowlines, and well/production pad outside of the Beaumont Unit and will retain a vegetated buffer between the pad sites and the Unit.	all resources and values in Big Thicket National Preserve
3	Peoples would construct a ring levee around the well pad to contain runoff.	water resources, vegetation, soils
4	Peoples would directionally drill the well so that wellbore does not intercept useable quality groundwater inside the Preserve.	groundwater in Preserve
5	Peoples would use a closed-loop containerized mud system below the level of surface casings.	water resources, soils, vegetation
6	Peoples would set surface casings according to Railroad Commission of Texas requirements.	groundwater
7	Peoples would dispose of drilling mud and well cuttings off-site or downhole depending on acquisition of necessary permits and approvals.	all natural resources located on and adjacent to well pad
8	Peoples has in place firewalls of earthen material and limestone that would be sufficiently impervious to contain spills around the tank batteries, separation and treating facility installations with secondary containment for the entire capacity of the largest single container and with sufficient freeboard to contain precipitation.	water resources, soils, vegetation
9	Peoples would drain accumulated rainwater from the ring levee contingent upon the absence of any visible sheen.	water resources, soils
10	Peoples would ensure that drainage of ditches in and around the production facilities would be visually inspected daily by the facility operators.	water resources, soils
11	Peoples would implement erosion control around the sites as needed.	water resources, soils
12	Peoples would notify regulatory authorities and the Big Thicket Superintendent in the event of an emergency.	all natural resources
13	Peoples would use existing flowlines and bury any new flowlines necessary a minimum depth of 3 feet within the existing pad. Also, Peoples activities would take place in a non-wetland surface and protect and directionally drill under any adjacent wetlands.	soils, water resources, human health and safety, wildlife, geology, vegetation

Table 1, Voluntary Mitigation Measures included in Peoples' Application

No.	Mitigation Measures-Proposed Action (Alternative B)	Resource(s) Protected
14	Peoples would follow RRC Statewide Rules for well plugging.	all natural resources
15	Peoples would follow RRC Statewide Rules for reclamation.	all natural resources

Errata Sheet

Section 1.3 Issues and Impact Topics Evaluated, Third Paragraph, Third Sentence “The letter was dated June 14, 2005, and contained no substantive comments that resulted in new issues or alternatives for analysis in this EA.”

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Substantive Comments (all from Sierra Club, Houston Regional Group)

Comments	NPS Responses
<p>1. The Sierra Club is concerned that NPS has not provided the public with a scoping comment period of 30 days. The Sierra Club is concerned that NPS provided only 14 days for the public scoping comment period. This is unacceptable. At a minimum of 30 days for the public scoping comment period must be required. The Sierra Club requests that this DEA be shelved and that NPS provide a full 30 day scoping period.</p>	<p>The purpose of public scoping is to determine the scope of issues to be addressed and to identify the significant issues related to a proposed action. The Preserve prepared a public scoping brochure that provided a preliminary list of issues and alternatives being considered for analysis in the EA. The purposes of the public scoping brochure were to announce and facilitate the public scoping process.</p> <p>The public scoping period in this case was from June 8, 2005, to June 23, 2005, a period of 15 days. The Preserve Superintendent has the prerogative to set the length of public scoping. The NPS believes that this period is sufficient for operations of this type that involve directional drilling into the Preserve. The NPS did not receive any substantive comments that identified any new issues or alternatives for analysis in the EA.</p>
<p>2. On page I, NPS states that "there would be no measurable effects on most Unit resources and values" due to the drilling of the well. NPS must define what this phrase means so that the public and the decision-makers can review, comment on, and understand its appropriateness.</p>	<p>The NPS describes the severity of impacts using four intensity levels: negligible, minor, moderate, and major. The NPS defines "measurable" as moderate or greater effects. It equates "no measurable effects" as minor or less effects. "No measurable effect" is used by the NPS in determining if a categorical exclusion applies or if impact topics may be dismissed from further evaluation in an EA or EIS. The use of "no measurable effects" in this EA pertains to whether the NPS dismisses an impact topic from further evaluation in the EA. The reason the NPS uses "no measurable effects" to determine whether impact topics are dismissed from further evaluation in the EA is to concentrate on the issues that are truly significant to the action in question, rather than amassing needless detail (40 CFR Part 1500.1(b), Purpose).</p>
<p>3. On page 1, fourth paragraph, NPS states that "NPS determined the application to be substantially complete". NPS must</p>	<p>The NPS uses the term "substantially complete" upon finding that Peoples' directional drilling application contains all</p>

Comments	NPS Responses
<p>define what this phrase means so that the public and the decision-maker(s) can review, comment on, and understand its appropriateness.</p>	<p>information required by the Superintendent and is sufficiently detailed for the NPS to effectively analyze the impacts of the proposed operations on park resources and values. At this point, the NPS proceeded to complete its analysis of the application, posted the environmental assessment on the PEPC website, and released the EA for public review and comment.</p>
<p>4. On page 4, 1.1 Objectives of Taking Action and on page 7, 1.2.2 BTNP Enabling Act, paragraph one, NPS states it will provide Peoples with reasonable access for exploration and development. NPS must define what this phrase means so that the public and the decision-maker(s) can review, comment on, and understand its appropriateness.</p>	<p>One of the primary rights associated with the mineral interest is the right of reasonable access to explore for and develop the mineral interest. If the mineral interest holder chooses to exercise its right to explore for or develop its mineral interest, the NPS must grant some form of access in the park. However, access to nonfederal oil and gas which requires access on, across, or through federally owned or controlled lands or waters within the park is subject to the NPS's nonfederal oil and gas rights regulations, codified at 36 CFR Part 9, Subpart B.</p>
<p>5. On page 5, 1.2.1 NPS Organic Act and General Authorities Act - Prevention of Impairment, third paragraph, the definition of impairment is not complete. Cumulative impacts due to the proposed project and other similar projects should also influence whether an impairment has occurred.</p>	<p>See the fourth sentence of the fourth paragraph of section 1.2.1 on page 5 of the EA, which reads:</p> <p>"Whether an impact meets this definition depends on the particular resources and values that would be affected; the severity, duration, and timing of the impact; the direct and indirect effects of the impact; and the cumulative effects of the impact in question and other impacts." [emphasis added]</p>
<p>6. On page 7, 1.2.3 NPS Nonfederal Oil and Gas Regulations, 36 CFR 9B, third paragraph, the Sierra Club disagrees that "The Service's jurisdiction under these regulations does not extend to any activities occurring outside park boundaries, even if such activities are associated with a nonfederal oil and gas operation occurring inside a park." The Sierra Club believes that the Organic Act requires and gives the NPS authority to</p>	<p>The scope of the NPS's jurisdiction under its regulations at 36 CFR Part 9B, including its authority under section 9.32(e), is limited to operations that occur inside the boundary of the park. On September 1, 2005, the United States District Court for the District of Columbia issued an order in <u>Sierra Club v. Mainella</u>, (Civ. No. 04-2012, 2005 U.S. Dist. LEXIS 18911), affirming this interpretation and validating NPS's application of section 9.32(e). The court</p>

Comments	NPS Responses
<p>ensure that park resources are not harmed even by actions that occur outside the Park System boundaries.</p>	<p>said that "the plain language of the 9B Regulations limits NPS's exemption process to the consideration of impacts from activities within a unit." Nonetheless, through the preparation of the environmental assessment, the NPS discloses potential impacts to park resources associated with operations occurring outside park boundaries and outside the Service's regulatory jurisdiction. The NPS also works with operators to encourage them to adopt mitigation measures on their operations located outside park boundaries in order to protect park resources.</p>
<p>7. On pages 4-9, the NPS must give a full explanation about the re-interpretation of the 9B regulations. The Sierra Club disputes the assertion that the NPS is interpreting its 36 CFR 9B regulations appropriately. The record is replete with NPS crawl-fishing on these regulations and re-interpreting them without public input as required in the Federal Register. The NPS relies on a "draft" solicitor's opinion that has not been made final. "Draft" means that the opinion is not final. The Sierra Club requested a copy of this opinion via the Freedom of Information Act (FOIA) but NPS refused to provide a copy claiming attorney-client privilege. An appeal has been pending since September 8, 2003 for information about NPS activities connected with this re-interpretation of the 9B regulations.</p> <p>The NPS has in its files interviews with some of the persons who originally developed the 9B regulations. Their statements contradict NPS's reinterpretation of the 9B regulations. From 1979 to 2002 the 9B regulations were implemented differently than NPS implements them now. The jurisdiction that NPS does have on activities outside the BTNP is in protecting park resources. If park resources are threatened,</p>	<p>In May of 2003, NPS park staff, resource program leaders, and staff from the Department of the Interior Solicitor's office met to clarify the scope of the NPS regulatory provision addressing the directional drilling of nonfederal oil and gas within NPS units (36 CFR § 9.32(e)). On November 14, 2003, the NPS Associate Director, Natural Resource Stewardship and Science, signed a memorandum entitled, "Final Guidance on Implementing the Directional Drilling Provision of the Service's Nonfederal Oil and Gas Regulations at 36 CFR 9B." The November 2003 memo is guidance to assist park staff in implementing the directional drilling provision. No new regulatory language has been written, created or otherwise issued thereby. United States District Judge John D. Bates ruled on September 1, 2005 that this document "... is not a final agency action requiring notice and public comment or subject to judicial review" under the Administrative Procedures Act. <u>Sierra Club v. Mainella</u>, (Civ. No. 04-2012, 2005 U.S. Dist. LEXIS 18911) The NPS's final guidance on § 9.32(e) clarifies the scope of § 9.32(e), the regulatory options available, issues dealing with the implementation of § 9.32(e), and NPS's compliance responsibilities under key statutes, including NEPA and various Executive</p>

Comments	NPS Responses
<p>adequate protection cannot be achieved, and the values and resources will suffer impairment then NPS can condemn those minerals rights so they will never cause the degradation of park resources.</p>	<p>Orders. The NPS has provided the Lone Star Chapter of the Houston Sierra Club a copy of the November 14, 2003 final guidance, a copy of Interim guidance on this issue, dated May 21, 2003, and other documents related to the NPS's efforts to clarify the scope and applicability of § 9.32(e). These documents were provided in response to multiple requests from the Lone Star Chapter pursuant to the Freedom of Information Act. The information contained in the November 14, 2003 final guidance memo constitutes the NPS's response to the substantive issues raised by the Lone Star Chapter of the Sierra Club regarding the 36 CFR § 9.32(e) provision.</p> <p>Also see Response #6.</p>
<p>8. On pages 7-9, 1.2.3 NPS Nonfederal Oil and Gas Regulations, 36 CFR 9B, NPS has stated in this and other DEA's that it is not granting an "approval." This is an incorrect statement. The granting of a waiver to allow drilling through the BTNP is an approval because it ensures that Peoples does not have to develop a plan of operations and post a bond. The drilling by Peoples does trigger the significance test found in the National Environmental Policy Act (NEPA) so this is a "major federal action significantly affecting the quality of the human environment." Therefore an environmental impact statement (EIS) should be prepared.</p> <p>If NPS argues that the drilling is not significant then the Sierra Club's response is that the drilling of multiple wells next to the BTNP and through the BTNP via slant drilling in addition to the proposals to drill wells within the BTNP in the Turkey Creek and Big Sandy Units does constitute the crossing of the significance threshold and requires that a programmatic EIS be prepared for the entire BTNP oil/gas program. There is no</p>	<p>NPS directional drilling guidance issued on November 14, 2003, by the NPS Associate Director, Natural Resource Stewardship and Science entitled, "Final Guidance on Implementing the Directional Drilling Provision of the Service's Nonfederal Oil and Gas Regulations at 36 CFR 9B" directs NPS staff to prepare environmental assessments on all directional drilling proposals submitted to the NPS even though it can be argued that NEPA is not triggered by exemption determinations under subsection 9.32(e).</p> <p>The NPS's November 14, 2003 guidance advises park managers that issuing an exemption with no mitigation does not constitute approval or the issuance of a permit. This conclusion was based on a thorough review of the issue by the NPS and the Department of the Interior Solicitor's office.</p> <p>Through its analysis, NPS determined that in this case there will be no major effects from the proposal, either from in-park operations or from connected actions occurring outside the Unit. Cumulative</p>

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<p>oil/gas management plan approved, which assesses the total direct, indirect, connected, secondary, and cumulative impacts of multiple wells drilled inside and just outside the B-TNP. The Sierra Club requests NPS finalize such an EIS and cease all work on DEAs until this document is final.</p> <p>The Sierra Club requests NPS approve a programmatic oil/gas management plan first before addressing individual well requests.</p>	<p>impacts of past, present and reasonably foreseeable future drilling activity, in addition to other cumulative actions in and adjacent to the Unit, are addressed in the draft plan/EIS.</p> <p>Big Thicket National Preserve is preparing a programmatic oil and gas management plan/EIS. The draft plan/EIS was released for public review and comment from December 3, 2004 through March 10, 2005. Cumulative impacts of past, present and reasonably foreseeable future drilling activity, in addition to other cumulative actions in and adjacent to the Unit, are addressed in the draft plan/EIS. The NPS is currently completing the final plan/EIS.</p>
<p>9. On pages 9-10, 1.2.5 NPS Monitoring of Nonfederal Oil and Gas Operations, NPS states that "must coordinate the timing of such access with the operator."</p> <p>NPS has agreed that "mitigation measures" are voluntary. Therefore NPS's reliance on these to state that park resources will be protected is misplaced and incorrect. The actual potential impacts are greater than NPS states throughout its impact analysis and must be changed to reflect the voluntary nature of the "mitigation measures".</p> <p>Either the mitigation measures are required and enforceable or they are voluntary and not enforceable and therefore cannot be used to get out of NEPA's "hard look" requirements in the EA or in an environmental impact statement (EIS).</p> <p>The Sierra Club vigorously disagrees with NPS that directional drilling operations are exempt without conditions from the regulations because of lack of impacts, that there is no 9B regulatory reason to access the surface location outside the park. This blatant</p>	<p>See the previous two responses.</p> <p>NPS monitoring and enforcement authority is covered in Sections 1.2.4 and 1.2.5 of the EA. As described in Section 1.2.3 of the EA, the proposed Peoples directional well qualifies for an exemption with no mitigation; therefore, the NPS cannot and did not require any of the mitigation measures proposed by Peoples to be implemented as part of its proposal.</p> <p>CEQ's 40 Most Asked Questions on NEPA Regulations Memorandum addresses the use of mitigation in an EA (see question #40). It states that, "Mitigation measures may be relied upon to make a finding of no significant impact only if they are imposed by statute or regulation, or submitted by an applicant or agency as part of the original proposal." Question 40 goes on to say, "In some instances where the proposal itself so integrates mitigation from the beginning that it is impossible to define the proposal without including the mitigation, the agency may then rely on the mitigation measures in determining that the overall effects would not be significant..." In this case,</p>

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<p>abdication of the NPS's responsibility is one of the reasons why the Sierra Club has sued NPS. But NPS stays silent about the lawsuit.</p>	<p>the mitigation was proposed by the operator and is integral to the proposal (e.g., the surface location outside of the park, the use of a containerized mud system, etc.). The NPS analyses indicate that impacts would be below the significance threshold both in and outside the boundary of the Preserve. Further, the operator is required to comply with all state and federal requirements to drill, produce and transport hydrocarbons which is expected to result in protecting the human environment from adverse impacts. See Response #23</p> <p>The NPS did take a "hard look" by considering the direct, indirect, and cumulative impacts (effects) of the proposed action on the environment, along with connected, cumulative and similar actions.</p>
<p>10. On page 10, 1.27 Approved Park Planning Documents, the programmatic oil/gas management plan is draft and is not final and cannot be listed as an "approved park planning document". This document and the policy it implements may change before it is final.</p>	<p>The referenced text on Page 10 of the EA explains that the programmatic oil and gas management plan is currently in draft. It further explains the rationale for the NPS to follow the draft planning framework as follows: "The NPS followed the planning framework of the Preserve's Draft Plan/EIS to prepare this EA because the draft plan provides logical steps that are applicable whether or not the document is finalized."</p>
<p>11. On page 11, 1.3 Issues and Impact Topics Evaluated, third paragraph, NPS states that the Sierra Club's June 14, 2005 scoping letter about the Peoples well "contained no substantive comments that resulted in new issues or alternatives for analysis in this EA that were not already listed in the public scoping brochure."</p> <p>This statement is incorrect. The following substantive issues were brought up that were not in the public scoping document:</p> <ol style="list-style-type: none"> 1) Re-interpretation of the 9B rules. 2) The granting of a waiver is an 	<ol style="list-style-type: none"> 1) The applicability of the directional drilling provision of 36 CFR 9B is described in sections 1.2.3 and 1.2.5 on pages 7 through 9 of the EA. See also Responses #6 and #7. 2) See Response #8. 3) See Responses #8, #11, #12, #13, and #26. 4) See Section 2 of the EA, Alternatives. Two alternatives were evaluated in detail, and three other alternatives were considered but dismissed from further analysis. See Response #18 5) See Response #26. Cumulative impacts were assessed in the EA. 6) See Response #9.

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<p>approval.</p> <p>3) Failure to address all cumulative impacts for past, present, and reasonably foreseeable actions.</p> <p>4) That all reasonable alternatives have not been given equal analysis.</p> <p>5) That the CEQ document for assessing cumulative impacts has not been used for the cumulative impacts analysis.</p> <p>6) The weakening of monitoring requirements that NPS has implemented.</p> <p>7) The failure of the NPS to define certain words and or phrases so that the public and the decision-maker can review, comments on, and understand their meaning.</p> <p>8) NPSs failure to quantitatively assess, as required by NEPA and CEQ NEPA implementing regulations and rules.</p> <p>9) NPS use of "voluntary" mitigation measures that are not enforceable but which are claimed by NPS as reducing environmental impacts of the proposed action.</p> <p>10) That NPS must reveal the impact on all roads and bridges that are used to access the well site, the pipeline, and any associated activities.</p> <p>11) That NPS must analyze, assess, and evaluate the impacts from the Peoples well and cumulative impacts on solitude in the Beaumont Unit.</p> <p>12) That NPS must assess how displaced wildlife does not come back to degraded or destroyed habitat right away or at all. This would be a long-term impact of probably 20 years or more even if the well is dry. When habitat is lost, unless other habitat nearby is not at carrying capacity, wildlife displaced will die unless they kill or displace existing wildlife in suitable habitat.</p> <p>13) That NPS must assess the indirect, cumulative, and connected impact that the produced water will have at the place where it will be discharged for</p>	<p>7) See Response #2, #3, #4 and #39.</p> <p>8) See Response #25.</p> <p>9) The applicability of the directional drilling provision under § 9.32(e), monitoring and enforcement, and mitigation measures are described adequately in the EA in Sections 1.2.3, 1.2.4, 1.2.5, and Section 2.2.5 (2nd paragraph). Also see Responses #7, #8, #9, and #23.</p> <p>10) See Response #12. The NPS interdisciplinary team did not identify impacts on all roads and bridges that are used to access the well site, the pipeline, and any associated activities as an issue; therefore this topic is not evaluated in the EA. Section 2.2.1 of the EA, on page 29, describes access for the proposal; and, Section 3.5 describes impacts from construction and maintenance of the access road, and vehicle use on "Geology and Soils" under the heading "Impacts on Adjacent Landowners, Resources and Uses."</p> <p>11) Solitude was not discussed as a separate impact topic in the EA, but is included in the analysis as a part of the overall visitor experience. The impacts from the proposed operations on air quality, natural soundscapes, and lightscapes are described on pages 24 and 25 of the EA.</p> <p>12) The impact on wildlife is described in Section 3.5 under the heading "Wildlife," on pages 61 and 62.</p> <p>13) Section 2.2.2, 6th paragraph, states: "Disposal of drilling fluids and cuttings would occur offsite or downhole depending on Peoples' acquisition of necessary permits and approvals." The EA does not assess impacts of disposal at the facility where it may be disposed because the drilling fluids and cuttings would become the responsibility of the</p>

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<p>cleaning.</p> <p>In addition, the issue of air pollution, due to spills, fires, and explosions in a pipeline where the oil/gas will be pumped from the Peoples well has not been considered.</p>	<p>facility.</p> <p>See Response #14.</p>
<p>12. On page 17, 1.4 Issues and Impact Topics Eliminated from Further Analysis, the Sierra Club disagrees with NPS that Water Resources: Groundwater and Stream-flow Characteristics in and outside the Unit, Vegetation, Visitor Use and Experience, and Cultural Resources impacts should not be assessed within and or outside the BTNP. The impact and action within the BTNP cannot be separated from that outside the BTNP. The NPS artificially separates the impacts into inside the BTNP and outside the BTNP and connected and cumulative impacts when in fact all are due to what is happening due to oil/gas activities that affect BTNP and should be assessed in an EIS.</p>	<p>Section 1.4, describes issues and impact topics that were assessed to a limited extent before being dismissed from further evaluation because the proposal would result in no measurable impacts to them. CEQ requires that NEPA documents be "concise, clear, and to the point." They must "emphasize real environmental issues and alternatives" and be useful to the decision-maker and the public (1500.2). "Most important, NEPA documents must concentrate on the issues that are truly significant to the action in question, rather than amassing needless detail" (1500.1(b)).</p> <p>The NPS has intentionally presented the potential impacts inside the Preserve associated with the downhole in-park operations separately from the impacts in and outside the Preserve from the connected actions outside the Preserve. The impacts from the downhole in-park operations are analyzed to determine whether there is a significant threat to park resources and if the operations qualify for a § 9.32(e) exemption, whereas the analysis of the impacts from the connected actions are presented in addition to the downhole operations to disclose to the public all of the potential impacts on the human environment. Further, the impact analyses in Section 3 are organized by impact topic and by alternative. This methodology is intended to clarify and define the comparative differences between the alternatives. Cumulative impacts are presented for the analysis area which includes areas inside and outside of the Preserve.</p>

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<p>13. On page 19, 1.4.1 Socioeconomics, NPS needs to update its reasonably foreseeable development scenario which has already been exceeded. Since 2002 the Sierra Club has counted 33 wells that have been approved by the NPS in or through BTNP. The Sierra Club believes the data used by the NPS in the DEA underestimates the number of wells that have been approved and that will be drilled over the next 15-20 years.</p>	<p>The reasonably foreseeable development (RFD) scenario described in the EA is the same as described in the Draft Oil and Gas Management Plan/EIS. The RFD scenario envisions that up to 29 wells may be drilled over the next 15-20 years on up to 153 acres to produce the reservoirs underlying the Preserve. While 32 exemption determinations have been issued from 1999 to the present, only 19 wells have been drilled. To streamline the administrative review process, applicants often base their proposals on "best-case scenarios," which rarely come to fruition. Therefore, the RFD scenario is not out-of-date.</p> <p>To modify the RFD scenario based upon the most recent drilling information in and next to the Preserve is likely to result in an inflated RFD based upon the recent surge in drilling and production.</p>
<p>14. On page 20, 1.4.4 Socioeconomics, NPS does not assess, evaluate, and analyze the possible impacts of connecting the flowlines to existing pipelines regarding spills, explosions, fires, etc. that could occur and would be a connected impact. NPS must do this.</p>	<p>Please see page 30 of the EA under Section 2.2.3, Flowlines, for a discussion of the possible construction of a flowline to transport gas to existing pipelines. Also, please see page 45 of the EA under the heading "Impacts on Air Quality in and outside the Unit Under Alternative B, Proposed Action" for a discussion of impacts from the connected actions including the accidental release of hydrocarbons and treatment chemicals from flowlines.</p>
<p>15. On page 24, 1.4.4 Water Resources: Groundwater and Streamflow Characteristics in and outside the Unit, NPS does not assess, evaluate, and analyze the possible impacts of connecting the flowlines to existing pipelines regarding spills, explosions, fires, etc. that could occur and would be a connected impact. NPS must do this. NPS must provide a worst-case analysis for what would happen if a blowout, fire, spill occurs.</p>	<p>Please see page 57 of the EA under the heading "Impacts on Water Resources: Floodplains and Wetlands in and Outside the Unit under Alternative B, Proposed Action" for a discussion of the potential impacts on water resources as a result of pipeline leaks or ruptures. Also, see the previous response.</p> <p>The analysis in the EA evaluated impacts that could reasonably be anticipated to occur and not "worst-case scenarios." See Response #20.</p>
<p>16. On page 22, 4.4.5 Species of</p>	<p>Please see page 30 of the EA under the</p>

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<p>Management Concern in and outside the Unit, NPS states that "Nor would there be an effect on any state - listed species within the Unit from connected actions. The Alligator Snapping Turtle, Timber Rattlesnake, fish, and mollusks, in Appendix B, are species of concern and could be affected if gas/oil from this well flows through a pipeline that crosses a stream or other species habitat. Therefore there are some impacts due to connected actions and impacts that must be covered in the DEA.</p>	<p>heading 2.2.3 Flowlines. Flowlines associated with this project are confined to the proposed pad location.</p>
<p>17. On page 23, 1.4.6 Other Unit Resources and Values, Geology and Soils and Vegetation. NPS must discuss the impacts that would occur to all resources, not just freshwater aquifers due to blowouts, spills, and fires.</p>	<p>See pages 23 and 24 of the EA under the headings Geology and Soils and Vegetation.</p> <p>See Responses #14, #15, and #20.</p>
<p>18. On pages 27-39, 2.0 Alternatives, NPS has refused to conduct an alternative analysis on "all reasonable alternatives" as required by the President's Council on Environmental Quality's (CEQ) National Environmental Policy Act (NEPA) rules.</p> <p>NPS must analyze and include in the EA "all reasonable alternatives" including buying the mineral rights and or drilling in the Beaumont Unit. NPS has refused to analyze this reasonable alternative although the Sierra Club has submitted this alternative in its scoping and EA comments for the past several years. NPS violates CEQ NEPA implementing regulations found in Section 1502.14(a) when this occurs.</p> <p>This alternative is determined by NPS to not be reasonable on pages 32-33 of the DEA where NPS states, "Alternative locations for siting the well within the Unit were dismissed from further analysis because they would not meet the objectives as well as those being evaluated in detail." Without a full</p>	<p>A summary of the alternatives that were considered but dismissed from further analysis is included in the EA in Section 2.3. As stated in the EA, in Section 2.3.2, "In the event that a proposed operation cannot be sufficiently modified to prevent the impairment of park resources and values, the NPS may seek to extinguish the associated mineral right through acquisition, subject to the appropriation of funds from Congress." The proposal does not present a significant threat of damage to park resources. Therefore this alternative was considered and rejected.</p> <p>Section 2.3.1 of the EA, on p. 32-33 also considered but dismissed an alternative to drill within the Unit. Vertical and directional drilling from surface locations inside the Unit were described but dismissed from further analysis because these alternatives would not meet the objectives of taking action as defined in Section 1.1 of the EA as well as the selected alternative. In addition, the drilling of Peoples' well from a surface location inside the Unit would have greater impacts on Unit resources and</p>

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<p>environmental analysis and public review and comment period this statement cannot be asserted as authoritative or true.</p> <p>NPS has ignored alternatives that provide a mix of protective strategies. For instance, a buy-out of mineral rights for sensitive areas while allowing drilling in less sensitive areas. The NPS is ignoring CEQ NEPA implementing regulations which require the consideration and analysis of "all reasonable alternatives".</p>	<p>values than Peoples' proposed location outside the Unit. To further evaluate these unreasonable alternatives would be inconsistent with CEQ regulations and DO-12.</p> <p>No combination of a partial acquisition of Peoples' mineral interests underlying the Unit, while allowing drilling from a less sensitive area of the Unit, would yield a reasonable alternative that would meet the objectives of taking action better than the selected alternative.</p>
<p>19. On page 29, 2.2.1 Access, NPS does not assess the increased road maintenance, both in terms of actions to be done and costs of these actions, that will occur by using heavy equipment on existing roads for exploration and production purposes.</p>	<p>See Response #11.</p>
<p>20. On page 29, 2.2.2 Drilling, NPS relies on RRC standards to protect underground water but does not say what will occur if these standards fail or are not followed. The blowout of a well in Crosby, Texas recently should remind NPS that failures do occur and that NEPA requires that NPS analyze these possible failures and the environmental impacts that derive from them.</p>	<p>The NPS did not assess the impacts on ground water from a worst-case scenario that the casing concrete would not be set correctly. The NPS must rely on the RRC as the regulatory authority overseeing well casing and cementing to ensure that usable quality groundwater would be protected outside of the Preserve. Any casing problem under the Preserve would be at such a great depth that it would not affect any of the Preserve's surface or subsurface resources, including fresh water aquifers.</p> <p>See also Responses #7, #8, #9, #14, #15, and #17.</p>
<p>21. On page 30, 2.2.3 Flowlines, NPS does not document here or elsewhere in the DEA the environmental impacts that will occur if the existing pipeline used has a fire, explosion, or spill.</p>	<p>See Responses #14, #15, and #17.</p>
<p>22. On page 31, 2.2.5 Reclamation Plan, NPS must describe how the well pads will be reclaimed. There is no description of reclamation in the DEA. The topsoil must be saved and used when the well pads are reclaimed. NPS should report</p>	<p>See pages 29, 30 and 31 of the EA under the headings 2.2.2 Drilling and 2.2.5 Reclamation Plan.</p> <p>See Responses #7, #8, #9, and #23.</p>

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<p>what the surface use agreement states about reclamation.</p> <p>NPS admits that mitigation measures that Peoples has stated that it will adhere to are not enforceable. If they are not enforceable then NPS cannot use them to state that mitigation will reduce or eliminate impacts to the point of nonsignificance for issue impact analysis. The Sierra Club believes that since NPS is approving waivers which allow a company not to prepare a plan of operation or post a bond that in fact the mitigation measures, if Peoples agrees to them in writing, are enforceable as part of the approval process.</p> <p>In Table 2 the ring levee should be at least three feet high. A lower level is too easy to breach and will not contain enough spilled liquid to ensure contamination does not occur especially during periods of flooding. Another mitigation measure the NPS should require is lining of the well pad and any other dug facility to reduce the possibility of contamination of soil and groundwater.</p>	<p>Although a plastic liner on the wellpad is a standard requirement for wells being drilled inside the Unit, it is not a standard outside the Unit. The analysis was based only on the mitigation measures included in Peoples' directional drilling application.</p>
<p>23. On pages 31-32, 2.2.5 Reclamation Plan, Table 2, Mitigation Measures Included in Peoples; Proposal, the NPS does tell the public that the mitigation measures are voluntary and are not enforceable.</p> <p>An EIS is not complete unless it contains "a reasonably complete discussion of possible mitigation measures." <u>Robertson v. Methow Valley Citizens Council</u>, 490 U.S. 332, 352, 109 S.Ct. 1835, 104 L.Ed.2d 351 (1989). ("...omission of a reasonably complete discussion of possible mitigation measures would undermine the "action-forcing" function of NEPA. Without such a discussion, neither the agency nor other interested groups and individuals</p>	<p>The NPS based its § 9.32(e) exemption determination on information specific to Peoples' proposal to drill this particular well (information such as bottomhole depth, surface location outside the Unit, and depth at which the wellbore would cross the vertical plane of the Unit). Because the NPS determined that Peoples' proposed operations are exempt from the NPS's 9B regulations under § 9.32(e), the NPS cannot impose mitigation measures on Peoples, and whether or not Peoples implements its mitigation measures does not affect the NPS's exemption determination. The NPS included Peoples' mitigation measures in its EA only in the interest of informing the public of the possible impacts of</p>

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<p>can properly evaluate the severity of the adverse effects.") That requirement is implicit in NEPA's demand that an EIS must discuss " 'any adverse environmental effects which cannot be avoided should the proposal be implemented.' " <u>Id.</u> at 351-52, 109 S.Ct. 1835 (quoting NEPA, 42 U.S.C. § 4332(C)(ii)); see also 40 C.F.R. 5 § 1502.16(h) (stating that an EIS must contain "[m]eans to mitigate adverse environmental impacts").</p> <p>A "mitigated FONSI" is upheld when the mitigation measures significantly compensate for a proposed action's adverse environmental impacts. <u>Friends of Endangered Species, Inc. v. Jantzen</u>, 760 F.2d 976, 987 (9th Cir. 1985); <u>Greenpeace Action</u>, 14 F.3d at 1332-33. See also <u>City of Auburn</u>, 154 F.3d at 1033 (agency may condition its decision not to prepare a full EIS on adoption of mitigation measures). However, although mitigation measures need not completely compensate for adverse environmental impacts, <u>Friends of the Payette v. Horseshoe Bend Hydroelectric Co.</u>, 988 F.2d 989, 993 (9th Cir. 1993), the agency must analyze mitigation measures in detail and explain how effective the measures would be. <u>Northwest Indian Cemetery Protective Ass'n v. Peterson</u>, 795 F.2d 688, 697 (9th Cir. 1986), <u>rev'd on other grounds</u>, <u>Lyng v. Northwest Indian Cemetery Protective Ass'n</u>, 485 U.S. 439, 108 S.Ct. 1319, 99 L.Ed.2d 534 (1988). "A mere listing of mitigation measures is insufficient to qualify as the reasoned discussion required by NEPA." <u>Id.</u> Instead, mitigation measures should be supported by analytical data, <u>Idaho Sporting Congress v. Thomas</u>, 137 F.3d 1146, 1151 (9th Cir. 1998), even if that data is not based on the best scientific methodology available. <u>Greenpeace Action</u>, 14 F.3d at 1333. The general</p>	<p>Peoples' operations.</p> <p>If Peoples changes its proposal, then its operations may not qualify for a § 9.32(e) exemption. In that case, the NPS would need to issue a permit to authorize Peoples' operations within the Unit; would be required, as a matter of law, to prepare and environmental assessment to satisfy NEPA; and, through that process, might impose reasonable, mandatory mitigation measures on Peoples.</p> <p>See Response #9.</p>

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<p>invocation of a term like "Best Management Practices" does not satisfy the NEPA requirement that the analysis discuss measures to mitigate the proposed action's adverse environmental impacts. <u>Northwest Indian Cemetery Protective Ass'n v. Peterson, 565 F. Supp. 586 (D.C.Cal., 1983).</u></p> <p>In other words, the applicable regulations require that an EA discuss means to mitigate adverse environmental impacts of the proposed action. Those mitigation measures must be analyzed in detail and must explain, in detail, how effective they will be in mitigating any adverse environmental impacts. Without analytical data to support the proposed mitigation measures, these amount to nothing more than a "mere listing" of good management practices. A mere listing of mitigation measures is insufficient to qualify as the reasoned discussion required by NEPA. And simply pointing out that BMPs will be followed is not an adequate discussion of means to mitigate adverse environmental impacts.</p> <p>The DEA only discusses mitigation measures in a general sense, but does not analyze any mitigation measures in detail or explain how effective these measures would be. This could hardly qualify as a detailed analysis. This is particular the case since the "mitigation measures" are voluntary and do not have to be followed and are not enforceable by NPS.</p> <p>A detailed analysis would provide for specific criteria of oil/gas drilling exploration and production that reduce or eliminate environmental impacts. There is no analysis of why, for instance, RRC requirements for</p>	

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<p>underground groundwater protection are sufficient as mitigation measures. A mere listing of mitigation measures is insufficient to qualify as the reasoned discussion required by NEPA. These failures render the DEA deficient under NEPA.</p> <p>For the foregoing reasons, the DEA does not adequately analyze mitigation measures in detail and lacks an explanation of how these measures would be effective for this particular project. The mitigation measures are not supported by any site-specific analytical data. Therefore the DEA violates NEPA.</p> <p>Without this analysis and a showing that the mitigation measures will be effective at averting significant environmental effects, a FONSI is inappropriate and a full EIS must be done.</p>	
<p>24. On page 33, 2.3.2 NPS Acquisition of the Mineral Rights, NPS states that "These mitigation measures substantially reduce the potential for adverse impacts to Unit resources and values. As a result, the acquisition of mineral rights was dismissed from further consideration in this EA."</p> <p>In addition, NPS does not state what the voluntary nature of "mitigation measures" means since NPS cannot enforce their use and Peoples can refuse to implement them. Therefore the alternative of buying mineral rights is reasonable and must be analyzed as a "reasonable alternative".</p>	<p>See Responses #9 and #24</p>
<p>25. Dictionary usage of words or phrases will not suffice to provide the public with a clear picture of what the intensity, significance, and context of environmental impacts are. In other words, an all qualitative assessment, analysis, and evaluation of environmental impacts is not sufficient</p>	<p>See Response #38.</p> <p>The NPS included both quantitative and qualitative analysis of impacts. The NPS performed a quantitative analysis where it had the specific information to do so. Examples of the quantitative analysis performed in the EA include:</p>

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<p>to deal with the clearly articulated CEQ requirements in Section 1502.14.</p> <p>Quantitative assessment, analysis, and evaluation are necessary to ensure that alternatives and environmental impacts are clearly defined and shown in the EIS.</p> <p>The qualitative description of phrases used to describe environmental impacts or the protectiveness of an alternative does not provide the public with the degree of comparison required by the CEQ.</p>	<ol style="list-style-type: none"> 1) in Section 3.1, the total organic compounds that would be emitted during the drilling operation was calculated; 2) in Sections 1.4 and 2.2.1 through 2.2.3 measurements of the direct area of surface impacts, well depth and depth the wellbore would intersect usable quality ground water were provided to describe the proposed action and support impact analyses; and 3) in Section 3.2, decibel levels were used to describe impacts on the natural soundscape. The NPS did not use a change in decibels to define impact intensity levels because impacts are not simply determined by decibel change but also by the particular uses that would be affected within the analysis area. <p>Where specific information was lacking to perform a quantitative analysis, the NPS believes that its qualitative analysis is adequate to satisfy NEPA. NPS technical specialists (regulatory specialists, petroleum engineer, biologist, etc.) listed on page 67 of the EA either prepared or were consulted during the preparation of this EA, and provided input on the qualitative assessment of effects presented in the EA.</p>
<p>26. On page 42, Cumulative Impacts, NPS has failed to fully implement NEPA's requirement to analyze, assess, and evaluate cumulative impacts.</p> <p>At minimum, an adequate cumulative effects analysis must:</p> <ol style="list-style-type: none"> 1) Identify the past, present, and reasonably foreseeable actions of NPS and other parties affecting each particular aspect of the affected environment 2) Must provide quantitative information regarding past changes in habitat quality and quantity, water quality, resource values, and other aspects of the affected 	<p>Cumulative impacts from a variety of sources, including timber management and oil and gas exploration and development, are assessed in the EA. The cumulative impact analyses are based upon the description of nonfederal oil and gas development within and contiguous to the Unit, as provided under the heading "Socioeconomics" in Section 1.4.1, and the descriptions of park development and operations, and adjacent land use, provided under the heading "Cumulative Impacts" in Section 3.0. The opening paragraph under "Socioeconomics" in Section 1, and the second paragraph under "Cumulative Impacts" in Section 3.0 describe past, present,</p>

<p>environment that are likely to be altered by NPS actions</p> <p>3) Must estimate incremental changes in these conditions that will result from NPS actions in combination with actions of other parties, including synergistic effects</p> <p>4) Must identify any critical thresholds of environmental concern that may be exceeded by NPS actions in combination with actions of other parties</p> <p>5) Must identify specific mitigation measures that will be implemented to reduce or eliminate such effects</p> <p>The NEPA and the CEQ require that analysis, assessment, and evaluation of cumulative impacts be conducted. Please see Chapters 1502.16, 1508.7 and 1508.8 of the CEQ regulations which are binding on all federal agencies to implement.</p> <p>Please also see the CEQ's January 1997 document, "Considering Cumulative Effects Under the National Environmental Policy Act." It is clear that the NPS has an affirmative duty, a statutory duty, and a regulatory duty to carry out cumulative impacts assessment.</p> <p>The NPS in the past has attempted to short-circuit this required duty by suggesting there are no significant effects. NPS should use the CEQ's "Considering Cumulative Effects Under the National Environmental Policy Act" to conduct a cumulative impacts assessment.</p> <p>The NPS must utilize the CEQ document to the maximum extent possible so that a full and legal cumulative impacts assessment is conducted. But there is no specific quantitative cumulative impact assessment for any past, present, and reasonably future foreseeable action in the DEA. NPS is deficient in its cumulative impacts assessment. What are the impacts from the development of entire well fields? What are the pipeline impacts? Where are the impacts from other oil/gas activities? Where are the impacts from past logging? Where are the</p>	<p>and reasonably foreseeable future actions to base the cumulative impact analyses in Section 3.0.</p> <p>See Responses #8, #11, #12, and #13.</p> <p>As explained above, this text found under the heading "Adjacent Landowners and Uses," merely describes past, present, and reasonably foreseeable future actions that provide supporting data to base the cumulative impact analyses in Section 3.0. The cumulative impacts are found on pages 44, 45, 49, 50, 52, 53, 56, 58, 62, 63, and 66 of the EA.</p>
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impacts from past grazing?	
<p>27. On pages 43, 46, 51, 54, and 59, the only analysis that NPS has conducted for this DEA is "best professional judgment". "Best professional judgment" is where a group of people, using their experience, decide what is important. This level of assessment, analyses, and evaluation for environmental impacts and alternatives is an insufficient foundation upon which to base an EA.</p> <p>The qualitative description of phrases used to describe environmental impacts or the protectiveness of an alternative does not provide the public with the degree of comparison required by the CEQ.</p> <p>The use of "best professional judgment" is not a substitute when quantitative information is available to show what impacts are or could be. The interaction of the "Methodology" with the requirement in Section 1502.22 of the CEQ's NEPA implementing regulations must be discussed in detail in this EA.</p> <p>In the DEA the use of "best professional judgment" is the theoretical approach or research method that is generally accepted in the scientific community that NPS uses to assess the environmental impacts of oil/gas activities in, on, or through BTNP. Therefore NPS must give a thorough discussion of the use of this evaluation method in place of using quantitative data for the impact issue that is being discussed.</p> <p>NPS cannot substitute "best professional judgment" for gathering existing quantitative data that it does have or gathering quantitative data that does not cost an exorbitant amount to collect for this DEA. The Sierra Club opposes the use of "best professional judgment" in lieu of using existing or</p>	<p>The assessment of impacts using "best professional judgment" is an acceptable methodology, and is based on the judgment of the NPS technical specialists who were consulted during the preparation of the EA and who possess the knowledge and skill to assess the effects of the proposal.</p> <p>See Response #25.</p> <p>The EA identifies areas of analysis where specific information was not available. As an example, the NPS discloses in the impact analysis for "Cultural Resources" in Section 3.5, that an archeological resource survey was not performed in the project area outside the Unit.</p> <p>Refer to Section 2.0, Alternatives, last sentence, which states: "This section concludes with three (3) summary tables comparing the two alternatives."</p>

<p>not exorbitantly costly acquired quantitative data. The Sierra Club requests that NPS clarify and detail clearly the comparative differences between each alternative and define clearly what the words or phrases used mean.</p>	
<p>28. On pages 43-46, Impacts on Air Quality in and outside the Unit under Alternative A, No Action and Alternative B, NPS does not discuss that ozone is one of the air pollutants that is transported from one air-shed to another. NPS could use real quantitative air quality data to show impacts for both alternatives analyzed. NPS ignores what the air pollution impacts are of blowouts, spills, and fires and the quantification of these impacts.</p>	<p>The Interdisciplinary Team did not feel that the contribution to overall ground level ozone formation due to the proposed operation of internal combustion engines or electric motors warranted discussion in the EA. However, the impact on air quality from the proposed operations is expected to be widespread. See page 45 of the EA. Also, see Responses #14, #15, #17, and #20.</p>
<p>29. On pages 46-51, Natural Soundscapes, NPS does not address the environmental impacts on solitude.</p>	<p>See Response #11.</p>
<p>30. On pages 46-51, Natural Soundscapes, NPS does not address impacts by using decibels, which is the measure of sound that is used to determine environmental impacts. NPS could easily obtain this information from existing wells and could have conducting monitoring during past well drilling. This quantitative data is easily obtainable and NPS should gather this data so that real world impacts can be determined and so that the public and the decisionmaker(s) can review, comment on, and understand its appropriateness.</p>	<p>See Response #25.</p>
<p>31. On page 54, 3.4 Water Resources, Floodplains and Wetlands in and outside the Unit, NPS states that "Based on the survey, there are no jurisdictional wetlands or other waters of the U.S. within the proposed well expansion/production pad area. Representatives from the NPS visited the site in July 2005, and agree with this conclusion." Were the NPS representatives certified to delineate wetlands? Did NPS delineate wetlands? On what basis did NPS agree with the</p>	<p>See page 54 of the EA. The wetland delineation described in the EA was <u>informal</u>. The NPS was simply confirming the information provided by the operator on the environmental conditions at the proposed site, and communicating their confirmation to the public.</p>

<p>wetlands determination? If NPS does not have authority over wetlands on a private site outside of BTNP how can it make such a statement?</p>	
<p>32. On page 57, impacts on Water Resources: Floodplains, and Wetlands in and outside the Unit under Alternative B, Proposed Action, NPS must estimate the amount of sheet flow and sediment and pollutant discharges and determine what the impacts are quantitatively.</p>	<p>See Response #25.</p>
<p>33. NPS does not provide documentation of how much additional vehicle traffic will be generate on each road in the area that will be used.</p>	<p>Additional vehicle traffic is described under the heading Visitor Use and Experience on page 24 of the EA.</p>
<p>34. On pages 59-66, Impacts on Adjacent Landowners, Resources and Uses under Alternatives A & B, Air Quality, NPS fails to discuss air quality including road dust, hydrogen sulfide, and emissions from fires, explosions, releases, and spills under air quality. NPS is not disclosing all potential impacts due to the proposal.</p>	<p>See section 3.1 Impacts on Air Quality in and outside the Unit for a discussion of air emissions on adjacent lands.</p>
<p>35. On pages 64-66, Vegetation, NPS does not state, cumulatively what past logging, grazing, oil/gas development, and other impacts have been on private lands that are proposed to be drilled on.</p> <p>NPS does not state what the true magnitude of environmental impacts are. If vegetation is lost due to logging or cutting due to well activities then the time it takes to grow vegetation to the age it was before it was cut is the time period of the impacts.</p>	<p>See pages 62, 63, and 66 of the EA for discussion of the cumulative impacts on vegetation on adjacent lands.</p> <p>See pages 65 and 66 of the EA. Direct, indirect, and cumulative effects to vegetation from the proposal are expected to be long term.</p>
<p>36. On page 64, Alternative B, Cultural Resources, it is of great concern that the NPS has no idea what cultural resources may be impacted by this proposal. NPS should therefore not assume that impacts will not occur or will be minor.</p>	<p>See page 64 of the EA. "The NPS has no authority to require that Peoples (mineral and surface owner) survey proposed project areas outside the Unit boundary for cultural resources ..." Any impacts from the proposal to undiscovered cultural resources are expected to range from negligible to moderate in intensity.</p>
<p>37. On page 64, Alternative B, Geology and Soils, NPS does not state what the true magnitude of environmental impacts</p>	<p>See pages 64, 65, and 66 of the EA. Direct, indirect, and cumulative effects to soil from the proposal are expected to</p>

<p>are. If soil is lost due to erosion from well activities then the time it takes to create the amount of soil lost is the time period of the impacts.</p>	<p>be long term.</p>
<p>38. The Sierra Club requests definitions for many words and phrases in the EA. They are listed here:</p> <ul style="list-style-type: none"> • NPS uses the phrase "there is little controversy on the subject" • "Best professional judgment" is not defined. • NPS uses the phrase "substantially reduce" but does not define this phrase. • On page 43, Methodology, Air Quality, Negligible, NPS uses the phrase "change would be so slight that it would not be of any measurable or perceptible consequence". • On page 43, Methodology, Air Quality, Minor, NPS uses the phrase "change would be small and of little consequence." • On page 43, Methodology, Air Quality, Minor, NPS uses the phrase "Mitigation measures ... would be simple and successful." • On page 43, Methodology, Air Quality, Moderate, NPS uses the phrase "Mitigation measures ... would be extensive and likely successful." • On page 43, Methodology, Air Quality, Moderate, NPS uses the phrase "measurable, long-term, and localized". • On page 47, Table 6 Sound Level Comparison Chart, NPS uses the phrase "Near drilling rig". 	<p>The NPS has written the EA in plain language the general public can understand (40 CFR § 1502.8). Words used are intended to be understandable using standard dictionary definitions. Only jargon, technical terms, and acronyms are defined in the EA.</p>

<ul style="list-style-type: none"> • On page 48, Natural Soundscapes, Negligible, NPS uses the phrase "would be so slight that it would not be of any measurable or perceptible consequence." • On page 48, Natural Soundscapes, Minor, NPS uses 'the phrase "would be small and of little consequence." • On page 48, Natural Soundscapes, Minor, NPS uses the phrase "Mitigation measures ... would be simple and successful." • On page 48, Natural Soundscapes, Moderate, NPS uses the phrase "Mitigation measures ... could be extensive, but would likely be successful." • On page 48, Natural Soundscapes, Major, NPS uses the phrase "would have substantial consequences." • On page 48, Natural Soundscapes, Major, NPS uses the phrase "Extensive mitigation measures would be needed." • On page 48, Natural Soundscapes, Major, NPS uses the phrase "their success would not be guaranteed." • On page 51, Lightscape Management, Negligible, NPS uses the phrase "would be so slight that it would not be of any measurable or perceptible consequence." • On page 51, Lightscape Management, Minor, NPS uses the phrase "would be small and of little consequence." • On page 511, Lightscape 	
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<p>Management, Minor, NPS uses the phrase "Mitigation measures ... would be simple and successful."</p> <ul style="list-style-type: none"> • On page 511, Lightscape Management, Moderate, NPS uses the phrase "Mitigation measures ... would likely be successful." • On page 52, Lightscape Management, Major, NPS uses the phrase "would have substantial consequences." • On page 52, Lightscape Management, Major, NPS uses the phrase "Extensive mitigation measures would be needed ... their success would not be guaranteed." • On page 55, Water Resources, etc., Negligible, NPS uses the phrase "Impacts ... would be so light that it would not be of any measurable or perceptible consequence." • On page 55, Water Resources, etc., Minor, NPS uses the phrase "change would be small and of little consequence." • On page 55, Water Resources, etc., Minor, NPS uses the phrase "Mitigation measures ... would be simple and successful." • On page 55, Water Resources, etc., Moderate, NPS uses the phrase "Mitigation measures ... could be extensive, but would likely be successful." • On page 55, Water Resources, etc., Major, NPS uses the phrase "would be measurable and have substantial consequences." • On page 55, Water Resources, etc., Major, NPS uses the phrase 	
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<p>"Extensive mitigation measures ... and their success would not be guaranteed."</p> <ul style="list-style-type: none"> • On page 59, Adjacent Landowners, Resources, and Uses, Negligible, the NPS uses the words or phrases "slight and measurable or perceptible consequence." • On page 59, Adjacent Landowners, Resources, and Uses, Minor, NPS uses the words or phrases "small and of little consequence and simple and successful." • NPS must define what "small and of little consequence" and "simple and successful" means • On page 59, Adjacent Landowners, Resources, and Uses, Moderate, NPS uses the phrase "would have measurable impacts ... but would be relatively local." • On page 60, Adjacent Landowners, Resources, and Uses, Major, NPS uses the phrase "would have readily measurable impacts, with substantial consequences and be noticed on a regional scale." • On page 60, Adjacent Landowners, Resources, and Uses, Major, NPS uses the phrase "mitigation measures ... success would not be guaranteed". <p>NPS must define what these phrases mean so that the public and the decision-maker(s) can review, comment on, and understand its appropriateness.</p> <p>The qualitative description of phrases used to describe environmental impacts or the protectiveness of an alternative does not provide the public with the degree of comparison required by the CEQ. The Sierra Club requests that NPS</p>	
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clarify and detail clearly the comparative differences between each alternative and define clearly what the words or phrases used mean.	
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