

Supplement Analysis

for Strategic Petroleum Reserve Life Extension-II (SPR LE-II) Work Packages



DOE/EA-2073-SA-01

U. S. Department of Energy
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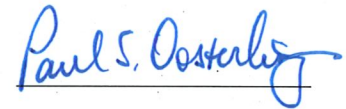
November 2019

SUPPLEMENT ANALYSIS DETERMINATION

In accordance with the National Environmental Policy Act (NEPA), the Council on Environmental Quality (CEQ) and Department of Energy (DOE) implementing NEPA regulations, the DOE Strategic Petroleum Reserve (SPR) Project Management Office has prepared this Supplement Analysis (SA) to evaluate whether the additional LE-II projects require supplementing the existing LE-II Environmental Assessment (EA).

Based on the application of criteria presented in this SA and the concurrence of counsel, DOE concludes that the new projects identified in this SA are not substantial changes relative to the proposal analyzed in the DOE/EA-2073 Final SPR LE-II EA dated April 6, 2018. Therefore, no further NEPA documentation is required.

Issued at New Orleans, this 15TH day of NOVEMBER 2019.



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Strategic Petroleum Reserve

Supplement Analysis of New Information for SPR LE-II

Introduction

The Department of Energy (DOE) has prepared this Supplement Analysis (SA) to evaluate one or more existing Environmental Assessment (EA) (listed below) in light of changes that could have bearing on the previous analysis. The Council on Environmental Quality (CEQ) NEPA regulations direct agencies to prepare a supplement to either a draft or final EA if the “agency makes substantial changes in the proposed action that are relevant to environmental concerns” or there are “significant new circumstances or information relevant to environmental concerns and bearing on the proposed action or its impacts.” (40 CFR 1502.9(c)(1)(i)–(ii)) DOE’s NEPA regulations state that when it “is unclear whether or not an EA supplement is required, DOE shall prepare a Supplement Analysis.” (10 CFR 1021.314(c)) This SA provides sufficient information for DOE to determine whether (1) to supplement an existing EA, (2) to prepare a new EA, or (3) no further NEPA documentation is required. (10 CFR 1021.314(c)(2)(i)–(ii)).

Existing EA evaluated in this SA:

- DOE/EA-2073 Final SPR LE-II EA dated April 6, 2018, available using the following URL address:

https://www.spr.doe.gov/NEPA/LE2/Final_SPR_LE-II_EA_6_April_2018.pdf

Proposed Change or New Information¹

This SA is being prepared for the following additional projects that have been identified since the completion of DOE/EA-2073 Final Strategic Petroleum Reserve (SPR) Life Extension (LE)-II EA dated April 6, 2018:

Bayou Choctaw

- Installation of microseismic data collection equipment in Caverns 4 and 20.

Installation of the microseismic system is in lieu of installation of a new monitoring well. It is a less intrusive way to fulfill the need to establish a baseline of the ambient seismic noise level. Analysis from data collected from this system will further assist in the design of a system capable of capturing microseismic events, reporting latitude and longitude event locations, event magnitudes and source parameters as the data allows. Abandon existing monitoring well. Leaving it in place without proper abandonment increases risk it may act as a conduit of contamination to the caverns.

West Hackberry

- Sixteen re-entry wells will be drilled at Caverns 101 through 116 and incorporate elevating well pad dikes per inundation and subsidence mitigation. (WH-LE-1749)

This task is to assure that SPR Level 1 drawdown rates are maintained in the aging single well caverns and upgrade cavern elevation to mitigate subsidence and inundation concerns to assure 25-year life of improved cavern and infrastructure.

¹ Throughout this document, the phrase “proposed change or new information” refers to a substantial change in a proposed action that may be relevant to environmental concerns or significant new circumstances or information that may be relevant to environmental concerns and have bearing on the proposed action or its impacts consistent with 40 CFR 1502.9(c).

Big Hill

- **Construction of a Raw Water Pigging Settling Pond (BH-LE-1778)**
The raw water settling pond will be for pigging water produced during cleaning operations of the raw water intake pipeline. It will be built in the location of the closed and remediated Anhydrite Pond 9. The raw water intake header would be modified to enable the pigging water to be diverted to the new settling pond.
- **Improvements to Wilber Road (BH-LE-1774)**
This work will result in the slight straightening of road curves adjacent to existing road. It will not change traffic patterns or otherwise create a scenario where land use in the vicinity is being changed, therefore the context is consistent with current use.
- **Road Resurfacing Big Hill Road (BH-LE-1774)**
Big Hill Road from the site to the raw water intake structure at the intracoastal waterway will be resurfaced.

Bryan Mound

- **Installation of microseismic data collection equipment at Cavern 3 (see Bayou Choctaw, above)**
- **Drilling replacement re-entry well into Cavern 5 Lower Lobe (BM-LE-1751) (see West Hackberry, above)**
- **Construction of new entry portal at southwest gate (BM-LE-1760)**
This work involves destruction of current entry portal support structures, therefore the context of the use of the area of the facility is appropriate as it will not change.

All locations: (BC-LE-1762 & 1775, BH-LE-1776 & 1763, BM-LE-1764 & 1773 and WH-LE-1765 & 1772)

The activities listed above will require supportive ancillary proposed actions such as the installment of contractor trailers (which require grading and stormwater drainage planning), the establishment of “laydown areas” which will allow for outdoor storage of construction equipment and the citing of soil stockpile areas.

Resource Areas Not Analyzed in this SA

The following resource areas will not be affected by the proposed change or new information and, therefore, are not analyzed in this SA:

- **Cultural Resources** – Recent (June 27, 2019) preliminary cultural resource studies were developed for all four SPR facility locations. The conclusion for each was the same: “no historic properties are identified on the proposed SPR project parcels or within 1.24 miles of the facility”. Risk to cultural resources does not exist and therefore this resource area is removed from analysis in this SA.

Please note that NEPA analysis does not replace or negate the need for National Historic Preservation Act (NHPA) Section 106 review. Therefore, any action that may affect the physical landscape are subject to review for possible adverse impacts to be identified. Coordination with the State Historic Preservation Office (SHPO) is required in all cases.

- **Ecological Resources/Threatened and Endangered Species** – A significant impact by the proposed action would be characterized as a requirement to engage in formal consultation with the United States Fish and Wildlife Service (USFWS); a “take” (as defined by the Threatened and Endangered Species Act [ESA]), or potential for “take”, of any individual or group of individuals of a listed species; or the loss or degradation, or potential for such, of any critical habitat (as defined by the ESA).

While there are threatened and endangered species in the Counties and Parishes represented here, there are no critical habitat areas located on SPR facilities. The referenced existing EA utilized the Fish and Wildlife Services’ Information for Planning and Consultation (IPaC) online tool to determine if critical habitat exists at SPR facilities, which may support the presence of threatened and endangered species. The report, which at the time of the existing EA development was dated December 11, 2017, indicated “there are no critical habitats within the project area”. An updated IPaC report was generated on April 15 and 16, 2019 which confirmed nothing has changed in the two years since the existing EA reports were generated.

- **Environmental Justice** – Criteria for determining significance for environmental justice includes creating an environment where the health and safety of socioeconomically disadvantaged community members and their surrounding area is at risk; creating undesirable living conditions for socioeconomically disadvantaged community members; and creating health and safety risks that may disproportionately affect children (as indicated in EO 13045 Protection of Children from Environmental Health Risks and Safety Risks).

Consistent with all other SPR proposed actions analyzed in the referenced existing EA, the proposed action will take place at the SPR facilities, which are highly secured with no access to unauthorized visitors. The temporary nature of the work, the distance from which the facilities sit away from the closest neighboring communities, and facility security (which removes risk of acute health and safety issues to unauthorized visitors by preventing access to the construction site) will not create a negative impact upon the sensitive population to which environmental justice applies. Therefore, further analysis is not warranted.

- **Land Use** – Criteria for determining significance for land use includes impairment of the original viewshed of adjacent properties and land use incompatible with existing adjacent land uses. The viewshed and land compatibility will not change, therefore further analysis is not warranted.
- **Prime Farmland/Soils** – the criteria for determining significance for prime farmland/soils is the unnecessary conversion of farmland to non-agricultural uses. There are soils at SPR facilities that are classified as farmland. The facilities have been used for industrial operation since the 1970s and the proposed action will not be changing the use. The proposed action will not necessitate the need to convert adjacent, prime farmland–classified land and therefore is removed from analysis in this SA.
- **Socioeconomics** – The existing EA confirmed that the SPR LE-II projects will not create a significant impact by creating an environment where the health and safety of socioeconomically disadvantaged community members and their surrounding area is at risk. A significant impact would include creating the potential to substantially affect human health or the environment by excluding persons, denying persons benefits, or subjecting persons to discrimination because of their race, color, national origin, or income level or creating undesirable living conditions for socioeconomically disadvantaged community members. In all cases, the only impact identified was short-term economic benefits, which may be seen with local construction-work hiring. That

conclusion is true of all the proposed actions under consideration for this SA, therefore further analysis is unwarranted.

Categorical Exclusions

Microseismic data collection equipment - It has been determined that the less intrusive microseismic data collection equipment to be used in Bayou Choctaw Caverns 4 and 20 and Bryan Mound Cavern 3 will be installed instead of new monitoring wells. This work is categorically excluded under 10 CFR 1021, Subpart D, Appendix B, B3.1 *Site characterization and environmental monitoring* which allows for “site characterization and environmental monitoring (including, but not limited to, siting, construction, modification, operation...) of characterization and monitoring devices”.

Abandonment of existing monitoring well - The microseismic data collection equipment will be installed of lieu of replacing this well at Bayou Choctaw; therefore, proper well abandonment is required. It has been determined that this work is categorically excluded under 10 CFR 1021, Subpart D, Appendix B, B5.3 *Modification or abandonment of wells*.

Supportive ancillary proposed actions (contractor trailers, “laydown areas”) – It has been determined that the “siting, construction and operation of support buildings” are categorically excluded under 10 CFR 1021, Subpart B, Appendix B, B1.15 *Support Buildings* where the definition of such support buildings includes trailers. Since the “construction” of such buildings is included in this categorical exclusion, all construction activities involved with the placement of them are included.

In addition, soil erosion is inherent in construction work. Implementation of **stormwater erosion control efforts** such as those planned for the construction of the support buildings and maintenance of the equipment laydown areas are categorically excluded under 10 CFR 1021, Subpart D, Appendix B, B5.3 *Stormwater runoff control*.

Activities to **demolish features of the existing Degas Unit (Vapor Pressure Plant)** for use as a laydown area at Big Hill, Bryan Mound and West Hackberry are categorically excluded under 10 CFR 1021, Subpart D, Appendix B, B1.23 *Demolition and disposal of buildings*.

Bryan Mound LE 2 New Entry Portal at Southwest Gate – Project numbered BM-LE-1760 includes the demolition of an existing security portal and the construction of a new one. The demolition is categorically excluded under 10 CFR 1021, Subpart D, Appendix B, B1.23 *Demolition and disposal of buildings*.

Construction of the new entry portal includes (but is not limited to): an entry portal shelter, vehicle inspection shelter, fencing, parking lots, hydraulic security barrier, cantilever gate barriers (arm gates). The work to accomplish this is categorically excluded under 10 CFR 1021, Subpart B, Appendix B, B1.15 *Support Buildings*, which includes structures for security, parking and visitor reception.

Road Resurfacing at Big Hill – Big Hill road will be resurfaced from the intersection of Big Hill Road and Wilbur Road to the raw water intake structure at the intracoastal waterway. Treated crushed stone will be laid after removal of the existing road material. The work to accomplish this is categorically excluded under 10 CFR 1021, Subpart B, Appendix B, B1.3 *Routine Maintenance*, paragraph (j), which allows for scraping and resurfacing, including construction of temporary access to facilitate the work (which covers the proposed construction easements).

Analysis in This SA

Additional Cavern Re-entry Wells at West Hackberry and Bryan Mound

Background

This work entails drilling of additional cavern re-entry wells and their components including expansion of cavern pads to accommodate the additional wells; therefore, context of the work and the resulting product are appropriate for the location and surrounding area. The addition of re-entry wells, expanded well pads and well heads at Caverns 101-116 at West Hackberry and Cavern 3 at Bryan Mound is mission critical for the protection of critical infrastructure and equipment. The sixteen caverns at West Hackberry operate with a single well. Operational issues over the last three decades have shown that these single well caverns possess operational vulnerabilities for removing crude when required for drawdown.

Resource Areas Analyzed in this SA (West Hackberry and Bryan Mound)

Two West Hackberry components analyzed in the existing EA are most similar to this work: WH-MM-1349/649/337 Subsidence and Inundation Mitigation and WH-MM-1350 Recomplete/Replace Brine Disposal Wells. These projects were used for analysis comparison.

The following resources areas could be affected by the proposed change or new information:

Comparison of Potential Environmental Impacts			
Resource Area	Summary of Potential Impacts in DOE/EA-2073 Final Strategic Petroleum Reserve (SPR) Life Extension (LE)-II EA dated April 6, 2018 projects WH-MM-1349/649/337 and WH-MM-1350	Summary of Potential Impacts as a Result of Proposed Change or New Information	Difference in Potential Impacts
Air Quality	Temporary, minor impact is anticipated. Vehicle traffic, (heavy, earth-moving) may temporarily increase particulate matter volume in the immediate area. Decreased air quality is not anticipated long-term or at all for the nearest off-facility residents. Vehicle and gas-powered generator emissions may increase VOC emissions, but National Ambient Air Quality Standards (NAAQS) exceedances are not expected. Project-specific	Temporary, minor impact is anticipated. Vehicle traffic, (heavy, drilling and earth-moving) may temporarily increase particulate matter volume in the immediate area. Decreased air quality is not anticipated long-term at the facility or at all for the nearest off-facility residents. Vehicle and gas-powered generator emissions may increase VOC emissions, but NAAQS exceedances are not expected. Project-specific permits will be obtained with	No difference in potential impacts.

	permits will be obtained with appropriate, short-term emission limits which will be monitored to ensure no exceedances. *Note: NAAQS data accessed from http://www.epa.gov/air/criteria.html accessed December 6, 2017.	appropriate, short-term emission limits which will be monitored to ensure no exceedances. *Note: NAAQS data accessed from http://www.epa.gov/air/criteria.html accessed April 18, 2019.	
Noise	Temporary, minor impact is anticipated. Heavy equipment and vehicles will be utilized to complete the proposed project and will result in an increase in noise levels normally heard during SPR facility operations. The largest contributors of noise would be on-site generators, jack and bore machinery, heavy earth-moving equipment and heavy trucks used to haul equipment, materials and construction debris. Human neighbors nearest the facility will not be impacted given the distance and the fact the work will be performed during daylight hours. Birds and other wildlife may be bothered by the increased noise level and may avoid the area until construction is complete.	Temporary, minor impact is anticipated. Heavy equipment, construction vehicles, grading equipment and drill rigs will be utilized to complete this work. It will result in an increase in noise levels normally heard during normal operations. The largest contributors of noise would be on-site generators, drilling machinery, heavy earth-moving equipment and heavy trucks used to haul equipment, materials and construction debris. Human neighbors nearest the facility will not be impacted given the distance and the fact the work will be performed during daylight hours. Birds and other wildlife may be bothered by the increased noise level and may avoid the area until construction is complete.	No difference in potential impact.
Water Resources	Temporary, minor impact is anticipated. Soil erosion is inherent with construction work and it is anticipated that turbidity in nearby surface water (Black Lake at West Hackberry) will increase. This will be minimized by the implementation of best management practices consistent with the SPR Pollution Prevention Plan (Publication ASL5400.41), Version 10.0 (08-02-16). It is not anticipated that the	Temporary, minor impact is anticipated. Soil erosion is inherent with construction work and it is anticipated that water turbidity will increase in the area of the Black Lake (West Hackberry) near where the work is being performed. This will be minimized by the implementation of best management practices consistent with the SPR Pollution Prevention Plan (Publication ASL5400.41), Version 10.0 (08-02-16). It is not anticipated that the	No difference in potential impact.

	<p>Mississippi River near West Hackberry would be impacted, nor would the Brazos River at Bryan Mound.</p> <p>Although the work will be taking place in and near wetlands, it is not anticipated that permanent harm or loss of wetland will occur.</p>	<p>Mississippi River would be impacted.</p> <p>Although the work will be taking place in and near wetlands, it is not anticipated that permanent harm or loss of wetland will occur.</p>	
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Mitigation

Comparison of Potential Environmental Impacts			
Resource Area	Summary of Mitigation in DOE/EA-2073 Final Strategic Petroleum Reserve (SPR) Life Extension (LE)-II EA dated April 6, 2018 projects WH-MM-1349/649/337 and WH-MM-1350	Summary of Changes to Mitigation as a Result of Proposed Change or New Information	Difference in Mitigation
Air Quality	Project-specific permits will be obtained with appropriate, short-term emission limits which will be monitored to ensure no exceedances.	Project-specific permits will be obtained with appropriate, short-term emission limits which will be monitored to ensure no exceedances.	No difference in mitigation.
Noise	The SPR LE-II Project Execution Plan indicates mitigation of noise will be considered early in the process so that it may be “reduced or eliminated at the design phase rather than when constructed or in use”. (DOE, 2017)	The SPR LE-II Project Execution Plan indicates mitigation of noise will be considered early in the process so that it may be “reduced or eliminated at the design phase rather than when constructed or in use”. (DOE, 2017)	No difference in mitigation.

Water Resources	Best management practices, adherence to USACE permitting restrictions, and results from Section 404 evaluation will avoid loss.	Best management practices, adherence to USACE permitting restrictions, and results from Section 404 evaluation will avoid loss. Erosion control plans will be written for all work, including the soil stockpile area where silt fencing, stormwater control and other erosion control measures will be implemented.	No difference in mitigation.
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Construction of a Raw Water Pigging Settling Pond at Big Hill

Background

The raw water settling pond will be for pigging water produced during cleaning operations of the raw water intake pipeline. It will be built in the location of the closed and remediated Anhydrite Pond 9. Therefore, the placement of a pond at the proposed location is in context for this facility and does not convert any land currently used for other use. The raw water intake header would be modified to enable the pigging water to be diverted to the new settling pond.

Resource Areas Analyzed in this SA (Big Hill)

One West Hackberry component analyzed in the existing EA is most similar to the construction of the Big Hill Raw Water Pigging Settling Pond work: WH-MM-1025 Raw Water Pigging Settling Pond. This project was used for analysis comparison.

The following resources areas could be affected by the proposed change or new information:

Comparison of Potential Environmental Impacts			
Resource Area	Summary of Potential Impacts in DOE/EA-2073 Final Strategic Petroleum Reserve (SPR) Life Extension (LE)-II EA dated April 6, 2018 project WH-MM-1025	Summary of Potential Impacts as a Result of Proposed Change or New Information	Difference in Potential Impacts
Air Quality	Temporary, minor impact is anticipated. Vehicle traffic, (heavy, earth-moving) may temporarily increase particulate matter volume in the immediate area. Decreased air quality is not anticipated long-term or at all for the nearest off-facility residents. Vehicle	Temporary, minor impact is anticipated. Vehicle traffic, (heavy, drilling and earth-moving) may temporarily increase particulate matter volume in the immediate area. Decreased air quality is not anticipated long-term at the facility or at all for the	No difference in potential impacts.

	and gas-powered generator emissions may increase VOC emissions, but NAAQS exceedances are not expected. Project-specific permits will be obtained with appropriate, short-term emission limits which will be monitored to ensure no exceedances. *Note: NAAQS data accessed from http://www.epa.gov/air/criteria.html accessed December 6, 2017.	nearest off-facility residents. Vehicle and gas-powered generator emissions may increase VOC emissions, but NAAQS exceedances are not expected. Project-specific permits will be obtained with appropriate, short-term emission limits which will be monitored to ensure no exceedances. *Note: NAAQS data accessed from http://www.epa.gov/air/criteria.html accessed April 18, 2019.	
Noise	Temporary, minor impact is anticipated. Heavy equipment and vehicles will be utilized to complete the proposed project and will result in an increase in noise levels normally heard during SPR facility operations. The largest contributors of noise would be on-site generators, jack and bore machinery, heavy earth-moving equipment and heavy trucks used to haul equipment, materials and construction debris. Human neighbors nearest the facility will not be impacted given the distance and the fact the work will be performed during daylight hours. Birds and other wildlife may be bothered by the increased noise level and may avoid the area until construction is complete.	Temporary, minor impact is anticipated. Heavy equipment, construction vehicles, grading equipment and drill rigs will be utilized to complete this work. It will result in an increase in noise levels normally heard during normal operations. The largest contributors of noise would be on-site generators, drilling machinery, heavy earth-moving equipment and heavy trucks used to haul equipment, materials and construction debris. Human neighbors nearest the facility will not be impacted given the distance and the fact the work will be performed during daylight hours. Birds and other wildlife may be bothered by the increased noise level and may avoid the area until construction is complete.	No difference in potential impact.
Water Resources	Temporary, minor impact is anticipated. Soil erosion is inherent with construction work and it is anticipated that turbidity in nearby surface water (West Hackberry) will increase. This will be minimized by the implementation of best management practices	No impact is anticipated. Besides a pond at the facility, the nearest surface water body in the intracoastal water is approximately four miles to the east, therefore soil erosion inherent to construction work is not anticipated to cause any impact to waters of the state.	The comparative project from the existing referenced EA has a potential for temporary, minor impact due to soil erosion. No impact is anticipated due to

	<p>consistent with the SPR Pollution Prevention Plan (Publication ASL5400.41), Version 10.0 (08-02-16). It is not anticipated that the Mississippi River would be impacted.</p> <p>Although the work will be taking place in and near wetlands, it is not anticipated that permanent harm or loss of wetland will occur.</p>	<p>The creation of this pond is actually increasing wetland resources at the facility. The other pond plus emergent and forested/shrub wetlands also exist but are not anticipated to be impacted at all since the work is not taking place within the wetland.</p>	<p>the creation of the pond.</p>
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Mitigation

Comparison of Potential Environmental Impacts			
Resource Area	Summary of Mitigation in DOE/EA-2073 Final Strategic Petroleum Reserve (SPR) Life Extension (LE)-II EA dated April 6, 2018 project WH-MM-1025	Summary of Changes to Mitigation as a Result of Proposed Change or New Information	Difference in Mitigation
Air Quality	Project-specific permits will be obtained with appropriate, short-term emission limits which will be monitored to ensure no exceedances.	Project-specific permits will be obtained with appropriate, short-term emission limits which will be monitored to ensure no exceedances.	No difference in mitigation.
Noise	The SPR LE-II Project Execution Plan indicates mitigation of noise will be considered early in the process so that it may be “reduced or eliminated at the design phase rather than when constructed or in use”. (DOE, 2017)	The SPR LE-II Project Execution Plan indicates mitigation of noise will be considered early in the process so that it may be “reduced or eliminated at the design phase rather than when constructed or in use”. (DOE, 2017)	No difference in mitigation.

Water Resources	Best management practices, adherence to USACE permitting restrictions, and results from Section 404 evaluation will avoid loss.	While no waters of the state are at risk due to project generated-erosion, general best management practices, adherence to USACE permitting restrictions, and results from Section 404 evaluation will still avoid potential stormwater issues for the facility itself. There is no potential for existing wetlands to be impacted or destroyed. Erosion control plans will be written for all work, including the soil stockpile area where silt fencing, stormwater control and other erosion control measures will be implemented.	No difference in mitigation for general best management practices, but no degradation to waters of the state or wetland areas surrounding the Big Hill site are at risk.
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Wilbur Road Improvements

Background

Improvements to Wilbur Road include the smoothing-out of three curved portions of the road. Smoothing-out will consist of small areas of new road construction within feet of the existing road curve. Construction easements measuring 50’-65’ will be needed on both sides of the road for each of the areas where work will be performed.

Resource Areas Analyzed in this SA (Big Hill)

One component analyzed for another SPR facility location, Bayou Choctaw in the existing EA is most similar to the Wilbur Road improvement work: BC-MM-1360 Site Road Access to BC-19, 101, 102 and Bailey Bridge. This project was used for analysis comparison.

The following resources areas could be affected by the proposed change or new information:

Comparison of Potential Environmental Impacts			
Resource Area	Summary of Potential Impacts in DOE/EA-2073 Final Strategic Petroleum Reserve (SPR) Life Extension (LE)-II EA dated April 6, 2018 project BC-MM-1360	Summary of Potential Impacts as a Result of Proposed Change or New Information	Difference in Potential Impacts
Air Quality	Temporary, minor impact is anticipated. Earth-	Temporary, minor impact is anticipated. Heavy	No difference in potential impacts.

	<p>moving vehicles and heavy vehicle traffic may generate increasing PM volume in the immediate area. It is not anticipated to decrease air quality for the nearest off-facility residents. Emissions from gas-powered generators and increased vehicle traffic may increase VOC emissions, but not to a degree where NAAQS thresholds are exceeded. Project-specific permits will be obtained with appropriate, short-term emission limits which will be monitored to ensure no exceedances. *Note: NAAQS data accessed from http://www.epa.gov/air/criteria.html accessed December 6, 2017.</p>	<p>equipment such as heavy trucks, and gas-powered generators are anticipated to be used for the duration of this work. Fugitive dust may generate increasing particulate matter volume in the immediate project area, but it is not anticipated to decrease air quality for the nearest residents. Increased VOC emissions from the gas-powered generators and vehicle traffic may occur, but no NAAQS thresholds will be exceeded. *Note: NAAQS data accessed from http://www.epa.gov/air/criteria.html accessed April 18, 2019.</p>	
Noise	<p>Temporary, minor impact is anticipated. Heavy equipment and vehicles will be utilized to complete the proposed project and will result in an increase in noise levels normally heard during SPR Big Hill facility operations. The largest contributors of noise would be on-site generators, jack and bore machinery, heavy earth-moving equipment and heavy trucks used to haul equipment, materials and construction debris. Human neighbors nearest the facility will not be impacted given the distance and the fact the work will be performed during daylight hours. Birds and other wildlife may be bothered by the increased noise level and may avoid the area until construction is complete.</p>	<p>Temporary, minor impact is anticipated. Heavy equipment, construction vehicles and grading equipment will be utilized to complete this work. It will result in an increase in noise levels normally heard during normal operations. The largest contributors of noise would be on-site generators, jack and bore machinery, heavy earth-moving equipment and heavy trucks used to haul equipment, materials and construction debris. Human neighbors nearest the facility (of which there are few) will not be impacted given the distance and the fact the work will be performed during daylight hours. Birds and other wildlife may be bothered by the increased noise level and may avoid the area until construction is complete.</p>	No difference in potential impact.

Water Resources	Temporary, minor impact is anticipated. Soil erosion is inherent with construction work and it is anticipated that an increase of silt will travel overland via stormwater to temporarily impact the Port Allen Lock channel. This will be minimized by the implementation of best management practices consistent with the SPR Pollution Prevention Plan (Publication ASL5400.41), Version 10.0 (08-02-16). Although the work will be taking place in and near wetlands, it is not anticipated that permanent harm or loss of wetland will occur.	Temporary, minor impact is anticipated. Soil erosion is inherent with construction work. There are no waters of the state in the immediate vicinity of the construction work. Any localized erosion will be minimized by the implementation of best management practices consistent with the SPR Pollution Prevention Plan (Publication ASL5400.41), Version 10.0 (08-02-16). Although the work will be taking place in and near wetlands, it is not anticipated that permanent harm or loss of wetland will occur.	No difference in potential impact.
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Mitigation

Comparison of Potential Environmental Impacts			
Resource Area	Summary of Mitigation in DOE/EA-2073 Final Strategic Petroleum Reserve (SPR) Life Extension (LE)-II EA dated April 6, 2018 project BC-MM-1360	Summary of Changes to Mitigation as a Result of Proposed Change or New Information	Difference in Mitigation
Air Quality	Project-specific permits will be obtained with appropriate, short-term emission limits which will be monitored to ensure no exceedances.	Project-specific permits will be obtained with appropriate, short-term emission limits which will be monitored to ensure no exceedances.	No difference in mitigation.
Noise	The SPR LE-II Project Execution Plan indicates mitigation of noise will be considered early in the process so that it may be “reduced or eliminated at the design phase rather than when constructed or in use”. (DOE, 2017)	The SPR LE-II Project Execution Plan indicates mitigation of noise will be considered early in the process so that it may be “reduced or eliminated at the design phase rather than when constructed or in use”. (DOE, 2017)	No difference in mitigation.

Water Resources	Best management practices, adherence to USACE permitting restrictions, and results from Section 404 evaluation will avoid loss.	Best management practices, adherence to USACE permitting restrictions, and results from Section 404 evaluation will avoid loss. Erosion control plans will be written for all work, including the soil stockpile area where silt fencing, stormwater control and other erosion control measures will be implemented.	No difference in mitigation.
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Determination

In accordance with the National Environmental Policy Act (NEPA) and CEQ’s and DOE’s implementing NEPA regulations, DOE prepared this supplement analysis to evaluate whether the additional LE-II projects require supplementing the existing EA or preparing a new EA. DOE concludes that the new projects identified in this SA are not substantial changes relative to the proposal analyzed in the DOE/EA-2073 Final SPR LE-II EA dated April 6, 2018. Therefore, no further NEPA documentation is required.