CITY OF
LONG BEACH

Development Services
411 West Ocean Boulevard, 3rd Floor Long Beach, CA 90802
562.570.5237

June 1, 2021

H-12

HONORABLE MAYOR AND CITY COUNCIL
City of Long Beach
California

RECOMMENDATION:

Receive the supporting documentation into the record, conclude the public hearing, accept and adopt Negative Declaration ND 02-20 for the Long Beach Building Standards Code Amendments Project relating to ordinances regulating construction adjacent to abandoned oil or gas wells, and construction near areas exhibiting detectable amounts of methane gas;

Declare an Ordinance amending Title 18 of the Long Beach Municipal Code by adding Chapter 18.78 relating to construction in the vicinity of oil/gas wells, read for the first time and laid over to the next regular meeting of the City Council for final reading; and,

Declare an Ordinance amending Title 18 of the Long Beach Municipal Code by adding Chapter 18.79 relating to methane gas mitigation, read for the first time and laid over to the next regular meeting of the City Council for final reading. (Citywide)

DISCUSSION

There are a total of 6,640 wells (1,947 active, 775 idle, and 3,918 abandoned) in Long Beach. With these wells and other soil and methane gas conditions come numerous overlapping regulations governing well construction, abandonment, and operations. The City of Long Beach (City) currently requires that construction projects proposing to develop near wells adhere to the California Geologic Energy Management Division (CalGEM) standards. The proposed action will create tailored regulations specific to Long Beach that provide better outcomes for public safety and a more efficient regulatory process for applicants.

Currently, CalGEM standards provide setback recommendations and well abandonment regulations. Construction projects near active wells are governed by the Fire Code. Long Beach utilizes the City of Los Angeles standards for methane gas detection and mitigation. Development projects proposed near wells are required to adhere to CalGEM recommended setbacks and abandonment regulations or must be reviewed on a case-by-case basis, if they diverge from these provisions.

The Department of Development Services is proposing to standardize the process for those seeking alternatives to the CalGEM provisions and to establish methane detection and mitigation regulations. A survey was conducted of best practices used by several Southern California agencies and City staff subsequently developed, and is recommending, alternative equivalent regulations to those of CalGEM as well as methane detection and mitigation regulations.

Wells

To develop near oil or gas wells, CalGEM requires that wells be abandoned in accordance with the most current State regulations, which currently involve multiple cement plugs (as many as eight cement plugs) and that all structures be set back certain distances from the abandoned wells. The proposed equivalency regulations establish three cement plugs (top of well, top of fresh water basin, and at the source of the oil extraction) or other approaches (subject to study) and allows construction over wells subject to certain safety provisions, including the installation of membrane barriers under the proposed structure(s). In addition, the equivalency regulations establish a process to locate and examine the condition of wells, places limits on the type of projects that can be developed near or over wells, and establishes provisions for testing, approval, and monitoring of wells.

Methane

As indicated previously, the City currently does not have construction-based methane detection and mitigation standards. The City has been using provisions from other jurisdictions and is currently using the City of Los Angeles standards. The proposed regulations establish a detection and mitigation process for those projects proposing to construct over areas with detectable amounts of methane. The process allows the opportunity to establish alternative mitigation measures that are based on the specific site conditions.

In accordance with Long Beach Municipal Code (LBMC) 18.10.020, the Board of Examiners, Appeals and Condemnation (BEAC) reviewed the proposed Ordinances on August 17, 2020, and October 19, 2020, and voted to recommend approval to the City Council. Additionally, an online community meeting was held on August 27, 2020, and members of the public, including local architects, developers, and other interested parties, attended the community meeting. The input received at the BEAC Board meeting and the community meeting were evaluated and addressed.

Staff also reached out to the local Long Beach/South Bay Chapter of the American Institute of Architects, the local office of the California Apartment Association, the Structural Engineers Association of Southern California, the Los Angeles/Ventura Chapter of the Building Industry Association, and the Downtown Long Beach Alliance (herein collectively referred to as Industry Partners) for input or feedback regarding the proposed new Chapters. Input was received from the Public, Industry Partners, and BEAC members. Numerous changes were made to the draft Ordinances based on that stakeholder feedback and the Department will continue working with those stakeholders to assure a smooth implementation of the regulations.

This matter was reviewed by Assistant City Attorney Michael J. Mais on May 6, 2021, and Budget Management Officer Rhutu Amin Gharib on May 7, 2021.

Public Noticing and Environmental Compliance

Public hearing notices were distributed on May 17, 2021, in accordance with the requirements of Chapter 21.21 of the LBMC. Any written testimony received following the preparation of this report will be provided to the City Council prior to the hearing.

In accordance with the Guidelines for Implementation of the California Environmental Quality Act (CEQA), Negative Declaration 20-02 was prepared for Long Beach Building Standards Code Amendments related to construction in the vicinity of oil wells and methane gas mitigation (Attachment A - Initial Study/Negative Declaration). The Negative Declaration was made available for a 30-day public review and comment period that began on May 27, 2020 and ended on June 25, 2020. No substantive public comments were received pertaining to the standards.

SUSTAINABILITY

The proposed Chapters work to address life-safety matters with construction in the vicinity of oil wells and mitigating the potential effects of methane gas, resulting in a healthier, cleaner and more viable environment for Long Beach.

TIMING CONSIDERATIONS

City Council action is requested on June 1, 2021.

FISCAL IMPACT

Staff costs to implement the new Ordinances will be offset by cost recovery fees. These fees are included in the mid-year fee adjustment presented to the City Council on June 1, 2021. Staff estimates 15 oil well and methane gas mitigation projects will occur over the next year. Plan check and inspection fees for these projects would result in approximately $70,000 in fees for services. This recommendation has no staffing impact beyond the budgeted scope of duties and is consistent with existing City Council priorities.

The proposed Ordinances are also anticipated to have a positive indirect fiscal impact on development in the city. This streamlined procedure for well abandonment construction near potential sources of methane gas will make development in the vicinity of oil wells less costly and future development in these areas more likely, leading to increased property tax revenues and potentially more local jobs.

SUGGESTED ACTION:

Approve recommendation.

Respectfully submitted,

OSCAR W. ORCI
DIRECTOR OF DEVELOPMENT SERVICES

APPROVED:

THOMAS B. MODICA
CITY MANAGER

ATTACHMENTS: ORDINANCES (2)
ATTACHMENT A – INITIAL STUDY/NEGATIVE DECLARATION

ORDINANCE NO.

AN ORDINANCE OF THE CITY COUNCIL OF THE CITY OF LONG BEACH AMENDING THE LONG BEACH MUNICIPAL CODE BY ADDING CHAPTER 18.78 RELATING TO CONSTRUCTION IN THE VICINITY OF ABANDONED OIL WELLS

The City Council of the City of Long Beach ordains as follows:

Section 1. The Long Beach Municipal Code is amended by adding Chapter 18.78 to read as follows:

Chapter 18.78

Construction in the Vicinity of Abandoned Oil Wells

18.78.010 Applicability.

All construction activities on a privately-owned parcel or on a tract or parcel containing an abandoned oil/gas well or wells shall meet the requirements of this Chapter. Construction activities on a privately-owned parcel or on a tract or parcel with active or idle wells shall comply with Chapter 18.48 of this Code. Construction projects involving assembly uses, caregiving facilities/hospitals, or schools such as those with an "A," "I," or "E" occupancy classification, as well as all "high rise" occupancy classifications shall meet the current CALGEM standards.

18.78.020 Exemptions.

Additions or Modifications. Additions or modifications to existing structures that are less than fifty (50) percent of the existing floor area of

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that structure, and which maintain the "Separation Rule" as defined herein are exempt from the provisions of this Chapter.

18.78.030 Definitions.

Unless otherwise expressly stated herein, the following words and terms shall, for the purpose of this Chapter, have the meaning set forth in this Section. Where the words or terms are not defined in this Section, Chapter 18.02 of this Code shall apply.

A. "Applicant" means a permit applicant, developer, owner, permittee, operator, or a representative of the owner who is applying for a building or grading permit to construct in the vicinity of an abandoned oil/gas well(s);

B. "Close Vicinity" means a well located within the Separation Rule of an abandoned well;

C. "Construction Activity" means construction activity including, but not limited to, grading, paving, and/or structure development;

D. "Geologic Energy Management Division" or "CALGEM" means the state of California agency, or any successor agency, responsible for overseeing the drilling, operation, maintenance, plugging or abandonment of oil, natural gas, or geothermal wells;

E. "Development Coordinator" means the Building Official, or designated representative(s) with the authority to review construction activity in the vicinity of oil/gas wells;

F. "Operator" means any person drilling, maintaining, operating, pumping, or in control of any well;

G. "Peer Review" means a consultant/team pre-approved by the Development Coordinator that is charged with the review of oil/gas well abandonment;

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H. "Permittee" means any person or entity seeking to obtain a permit from the City;

I. "Project Boundary" means the entire proposed construction site, parcel or tract, including the entire area of each and every site, parcel, or tract involved;

J. "Qualified Professional" means a petroleum engineer currently registered in the State of California and possessing experience in oil/gas well abandonment;

K. "Separation Rule" means providing ten (10) feet of separation on two sides of the well, fifty (50) feet of separation on the third side of the well, and the remaining side of the well open, with an unobstructed vertical clearance for well service and rig access;

A well will meet the Separation Rule if it meets the above definition or if the applicant can demonstrate to the Development Coordinator that the proposed project will maintain appropriate and safe standard/conventional rig access to the well.

18.78.040 Prerequisites.

Applicants shall complete the following prerequisite items prior to applying for a grading or building permit for construction within the project boundary:

A. Entitlements. Obtain all of the required land use entitlements of Title 21 (Zoning);

B. Identify all active, idle, or abandoned wells within the project boundary and all offsite active, idle, or abandoned wells within one hundred (100) feet of the proposed onsite structure(s);

C. Construction Site Well Review. Complete and submit a Construction Site Well Review (CSWR) Application to CalGEM;

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D. Well Safety Evaluation. Prepare a Well Safety Evaluation per Section 18.78.050;

E. Leak test Inspection Request. Submit a leak test inspection request to the Development Coordinator per Section 18.78.110.

18.78.050 Well Safety Evaluation Submittal requirements.

A well safety evaluation report shall be submitted to the Development Coordinator for wells within the project boundary and off-site wells within one hundred (100) feet of any proposed structure(s). The report shall include the following:

A. Well Status Report. A Well Status Report by CALGEM, or any successor agency, must be current to within the last twelve (12) months of formal project submittal to Plan Check and be inclusive of all relevant well work. A duplicate of the entire data package submitted to CALGEM shall also be submitted to the Development Coordinator;

B. Well Exhibit. A Well Exhibit shall be submitted to the Development Coordinator for review. The Well Exhibit shall contain all of the following elements:

1. A Site plan that illustrates all active, idle, or abandoned wells and the location and function of all existing and proposed development, including, but not limited to, paved surfaces, auxiliary structures, and occupied structures within the property boundary. Off-site wells within one hundred (100) feet of a proposed structure shall also be shown on the site plan;

2. For wells within the property boundary:

a. Diagram and description of any wells' drill rig accessibility within twenty- four (24) hours of any emergency. Compliance with the Separation Rule shall be clearly shown. If inaccessible within

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twenty-four (24) hours, a detailed written plan to provide access, including an approximate minimum time when access will be provided, shall also be required;

b. Results of leak testing: Applicants shall perform leak testing in accordance with Section 18.78.110;

C. Oil Well Assessment: An oil well assessment shall be submitted for all wells not abandoned to current CalGEM, or successor agency standards that are located within the project boundary and/or within one hundred (100) feet of a proposed onsite structure. The oil well assessment shall include:

1. A Well bore diagram for each well;

2. The Well bore diagram shall include:

a. The Well diameter;

b. The Casing and liner specifications and setting depths;

c. All cementing operations, including calculations of cement volumes;

d. Depths of various hydrocarbon zones and fresh-saltwater interfaces; and

e. Any other data required by the Development Coordinator to analyze the current conditions of the well, including casing recovery operations and the presence of debris in the well hole;

D. Off-site wells within one hundred (100) feet of a proposed onsite structure: If information on a well is unavailable, wells shall be considered active in accordance with Chapter 18.48 of the Long Beach Municipal Code.

E. Wells inaccessible by an emergency rig within twenty-four (24) hours will require further evaluation in accordance with Section 18.78.080.

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18.78.060 Well abandonment request.

A. Equivalency Request. An Equivalency Standard Request shall be submitted to the Development Coordinator for wells not abandoned to the current CALGEM standards, and which are affected by Construction Activity. The Request shall include the following:

1. Statement. A written statement setting forth the basis for the request and substantiating any claim of impracticality or hardship, for a Code modification, or a finding of equivalency to the existing Code requirements for any proposed alternative materials, design, or methods of abandonment or equipment utilization;

2. Any additional relevant information regarding the property, including nearby water injection wells, faults, floodplains, tsunami and/or seiche zones, landslide, or seismic consideration(s);

3. Leak test results in accordance with Section 18.78.120;

4. Long-term Safety Evaluation pursuant to Section 18.78.090, for any development proposing to build in close proximity to, or over an abandoned well(s);

5. The Report shall be stamped, signed, and dated by a Qualified Professional;

B. Review. The Development Coordinator shall have the authority to approve the well(s) "as-is", impose conditions in accordance with Section 18.78.220; or approve the Well Abandonment Equivalency request, and allow the well(s) to be abandoned in accordance with this Chapter, or deny the Well Abandonment Equivalency request if the Development Coordinator is not able to verify the information provided in the report;

C. Wells within the project boundary and unaffected by Construction Activity, which are not abandoned to any approved current or prior CALGEM standard, may be required to undergo review by the

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Development Coordinator. The Development Coordinator shall have the authority to approve the well(s) "as-is", or approve alternative abandonment methods, or impose appropriate development conditions.

18.78.070 Equivalency abandonment standard.

Construction proposed over, or within close proximity to, abandoned wells shall not be permitted unless the Development Coordinator has determined that the well(s) has been abandoned in accordance with CALGEM, or any successor agency's current abandonment standards, or to the City's equivalency standards. Equivalency abandonment requests must be reviewed and approved in accordance with Section 18.78.060 prior to abandonment, and in accordance with the following equivalency standards:

A. A cement plug located at the depth of the last oil/gas zone produced from the well. All perforations shall be plugged with cement, and the plug shall extend at least one hundred (100) feet above the top of a landed liner, the uppermost perforations, the casing cementing point, the water shut-off holes, or the oil or gas zone, whichever is higher. If wellbore conditions prevent placement of the plug at the depth of the last zone produced from the well, approximately one hundred (100) feet of cement shall be placed inside and outside of the casing above (but as close as possible to) the last zone produced from the well, but no higher than the base of the fresh water zone;

B. A cement plug located at the depth of the base of the freshwater zone in the well. If there is cement behind the casing across the fresh-saltwater interface, a one hundred (100) foot depth cement plug shall be placed inside the casing across the interface. If the top of the cement behind the casing is below the top of the highest saltwater sands, squeeze-cementing shall be required through perforations to protect the freshwater

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deposits. In addition, a one hundred (100) foot cement plug shall be placed inside the casing across the fresh-saltwater interface;

C. A cement plug located at the surface. The hole and all annuli shall be plugged at the surface with a cement plug extending at least fifty (50) feet from the top of the cut-off well casing;

D. Leak Test. Leak testing shall be performed per Section 18.78.120;

E. Vent Cones. Vent cone(s) shall be installed in accordance with Section 18.78.140;

F. Indemnity Agreement and Declaration of Covenant. The Applicant/Property Owner shall submit and execute an Indemnity Agreement per Section 18.78.200 and a Declaration of Covenant per Section 18.78.210 to the satisfaction of the City Attorney;

G. Upon receipt of the City's approval per Section 18.78.220, the Applicant may obtain the required permit(s) in accordance with the City's Building Code requirements.

18.78.080 Wells not accessible.

A. Access. Due to the uncertainty of future conditions, Applicants are encouraged to provide rig access when proposing to develop in close proximity to, or over wells;

B. Methane Mitigation. Wells with limited or no access shall be required to provide methane mitigation in accordance with Chapter 18.79 of this Code for construction projects being developed in close proximity to, or over wells, with no or limited rig access;

C. Confirmation. If the City cannot verify the well abandonment to either CALGEM's current standard or the City's equivalency standard, the well shall be abandoned so that the well passes the leak test and the well

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shall remain accessible for future testing and no building development shall occur in close proximity to, or over the well.

18.78.090 Long-term safety evaluation.

A. Purpose. Development projects with structures in close proximity to, or over an abandoned well, shall submit a Long-term safety evaluation;

B. Submittal. The Long-term safety evaluation shall provide a justification for any lack of rig access.

18.78.100 Above-well head mitigation.

The Applicant's Qualified Professional shall submit mitigation plans for Development Coordinator review in compliance with the City Standards for the well cone and vent system. The location of the well(s) and the associated vent piping system shall be noted on the site plan and the foundation plan, in addition to pages dedicated to the well protection system.

18.78.110 – Leak test request.

A leak test request shall be submitted to the Development Coordinator setting forth the following in accordance with Building and Safety Bulletin BU-054.

18.78.120 Leak testing. Leak testing in accordance with Building and Safety Bulletin BU-054.

18.78.130 Vent cone.

Shall be installed in accordance with Building and Safety Bulletin BU-054.

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18.78.140 Horizontal pipes.

Shall be installed in accordance with Building and Safety Bulletin BU-054.

18.78.150 Vent risers.

Vent risers shall be installed in accordance with Building and Safety Bulletin BU-054.

18.78.160 Site clean-up.

Any potential site cleanup shall be under the direction of City of Long Beach Health Officer or designee, and grading and compaction around the well head shall be per the grading permit requirements of the City.

18.78.170 Methane mitigation.

Building construction projects shall be mitigated in accordance with the requirements of Chapter 18.79 of this Code.

18.78.180 Exposure period.

A. Exposure period. If an oil well is abandoned through the City's Equivalency Standards, the associated leak testing is valid for the duration of one (1) year;

B. Significant event. A leak test shall be performed to the satisfaction of the Development Coordinator in accordance with Section 18.78.120 if the site experiences a significant event such as an earthquake, flooding, fire or other natural or manmade events;

C. Project Delay. Construction delays of more than one (1) year will require the owner/operator to perform a leak test pursuant Section 18.78.120;

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D. Speculative projects. Proposals to abandon a well in accordance with the City's equivalency process, but without a proposed development, shall be permitted in accordance with this Chapter. The Indemnity Agreement and Declaration of Covenant shall be recorded with the County Recorder's Office prior to issuance of the Well Abandonment Approval Notice.

18.78.200 Indemnity Agreement.

Upon project plan approval, the Applicant shall fully execute and record an "Indemnification for Construction in the Vicinity of Abandoned Oil Well(s)" in a format required by the City and approved by the City Attorney's Office for any wells that do not meet the current (at the time of property development) CALGEM standards for abandonment and/or maintenance accessibility or building separations.

18.78.210 Declaration of covenant.

Prior to final approval of any grading or building permit for development within the close proximity to, or over a former oil/ gas well, the permittee/applicant shall record a declaration of covenant, in a form subject to the review and approval of the City Attorney, putting future owners and occupants on notice of the following: the existence of abandoned oil wells on the site; that the wells within the site have been leak tested and found not to leak based on the date that testing was performed; an acknowledgment that CALGEM may order the re-abandonment of any well should it leak in the future; an acknowledgment that CALGEM does not recommend building over wells; and releasing and indemnifying the City and its various employees and agents for issuing project permits or granting any approvals. The covenant shall run with the land, apply to future owners or

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successors in interest , and may only be released by the City in writing. The Declaration of Covenant shall be recorded with the County Recorder's Office prior to the issuance of any permits.

18.78.220 Notice of well abandonment.

A. Well Abandonment Request and Equivalency Standard Review. The Development Coordinator or designee, including, but not limited to, the City's Peer Review consultant, shall review the Well Safety Evaluation report and other relevant information provided by the applicant for well/s that are submitted for Well Abandonment Requests and Equivalency Standard considerations in order to determine if the well abandonment is adequate to prevent hydrocarbons from reaching the surface of the well. The determination shall be based on, at a minimum, a review of a history of all work performed on the well, and an independently constructed detailed wellbore diagram showing the current condition of the well;

B. Safety Assessment Letter. The Development Coordinator or designee, including, but not limited to, a Peer Review Consultant, shall provide a Safety Assessment Letter based on provided\relevant project documentation to determine if the well(s) abandonment complies with the equivalency abandonment standard;

C. Inspections. Field inspections for the well abandonment will be based on receiving a final CALGEM approval letter for wells that will be abandoned to current CALGEM standards. For a well abandonment that will be submitted through the City's "Equivalency Standards", a certification letter shall be required from the projects Qualified Professional Engineer.

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18.78.230 Fees.

Well Safety Evaluation review fees consisting of peer review, well head inspection, leak test inspection, and Alternate Materials and Methods of Construction fees for oil well abandonment projects shall be paid in accordance with the latest Master Fee Resolution and City Schedule of Fees.

18.78.240 Post construction protocols.

The Owner/Applicant shall be responsible for monitoring and project maintenance.

18.78.250 Enforcement and violation.

The Building Official is hereby authorized and directed to enforce the provisions of this Chapter in accordance with Section 18.03.020.

18.78.260 Site restoration for vacated projects.

Should the developer/applicant decide not to continue site development, all excavations for any well discoveries shall be restored to their original condition prior to well discovery disturbance.

18.78.270 Adoption of administrative rules.

The City Manager, or designee, is authorized and directed to promptly adopt administrative rules, including but not limited to, Building and Safety Bulletins, supplemental to the provisions of this Ordinance as necessary or appropriate to implement the Ordinance. The provisions of this Ordinance and the rules adopted by the City Manager, or designee, shall be provided to property owners, developers, potential developers, and other interested members of the public to the widest extent practical. No person shall fail to

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comply with any such regulation as adopted.

Section 2. The City Clerk shall certify to the passage of this ordinance by the City Council and cause it to be posted in three (3) conspicuous places in the City of Long Beach, and it shall take effect on the thirty-first (31st) day after it is approved by the Mayor.

I hereby certify that the foregoing ordinance was adopted by the City Council of the City of Long Beach at its meeting of _____, 20____, by the following vote:

Ayes: Councilmembers: _____

_____

_____

_____

Noes: Councilmembers: _____

_____

Absent: Councilmembers: _____

_____

Recusal(s): Councilmembers: _____

_____

_____
City Clerk

Approved: _____ _____
(Date) Mayor

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ORDINANCE NO.

AN ORDINANCE OF THE CITY COUNCIL OF THE CITY OF LONG BEACH AMENDING THE LONG BEACH MUNICIPAL CODE BY ADDING CHAPTER 18.79 RELATING TO METHANE GAS MITIGATION

The City Council of the City of Long Beach ordains as follows:

Section 1. The Long Beach Municipal Code is amended by adding Chapter 18.79 to read as follows:

Chapter 18.79

Methane Gas Mitigation

18.79.010 Applicability.

Methane gas mitigation, as described herein, shall be required for all newly constructed buildings (structures), additions to existing buildings (structures), or changes of use that are located in the following areas:

A. All areas overlying petroleum-bearing formations and within the limits of a petroleum reservoir's boundary, as mapped by the State Geological Energy Management Division (CalGEM, or any successor agency). Properties or parcels which partially fall into the areas described herein are fully subject to the methane mitigation measures required by this Chapter, for the entire property.

B. Proposed development of structures, and/or impermeable surfaces adjacent to a structure, within less than or equal to three hundred (300) feet from any active, or one hundred (100) feet of an idle and/or abandoned oil/gas well.

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C. Proposed development of structures within one thousand (1,000) feet from the refuse footprint of any existing or new landfill or disposal site.

D. Upon a determination by the Development Coordinator that a hazard may exist from methane intrusion at any geographical location, or in an area outside the boundaries identified in Section 18.79.010, A through C, the Development Coordinator may enforce any and all of the requirements of Chapter 18.79 as required to prevent a potential fire or explosion due to methane gas concentrations.

E. Methane Soil Gas Investigations within the Coastal Zone are subject to the Local Coastal Development Permit (LCDP) requirements and procedures of Division IX, Chapter 21.25 of Title 21 – "Zoning", of this Code.

18.79.020 Definitions.

The following terms shall have the following meanings, unless otherwise clearly apparent from the context:

A. "Combustible soil gas" means flammable gas within soil pores.

B. "Development Coordinator" means the City Building Official or designee.

C. "Flammable Gas" means a gaseous substance capable of sustaining combustion or explosion, as defined in the California Fire Code.

D. "Gas Membrane Barrier" means a manufactured membrane barrier designed to prevent the transmission of methane with a minimum dry thickness of fifteen (15) mils and a gas transmission rate (GTR) of less than forty (40) milliliters per square meter day (ml/m2-D), when tested in accordance with the American Society for Testing and Materials (ASTM) D1434 standards.

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E. “Gas Collection Aggregate” means an aggregate used in the venting layer and gas collection trenches not containing more than five percent (5%) fines passing the No. 200 sieve.

F. “Methane Gas “means the hydrocarbon substance commonly known as “natural gas,” chemical formula CH4. For the purposes of definition, natural gas from the distribution system of a utility company is exempt and excluded from the scope of this Chapter.

G. “Methane Gas Detection and Alarm System” means one or more electrical devices capable of continuous monitoring for the presence of methane gas in accordance with Section 18.79.060. Alarm systems shall consist of audible and visual alarms capable of alerting occupants that a hazardous atmosphere exists.

H. “Methane System” means a collection of building systems designed to mitigate the accumulation of methane gas to less than hazardous levels within a structure. This includes a designed collection system of piping components located beneath a structure to vent combustible soil gas to the atmosphere; heating, ventilation, and air conditioning (HVAC) systems to introduce outdoor air into a structure to ventilate accumulated methane; and sensors and alarms to detect concentrations of methane gas, activate HVAC and/or active methane mitigation, and alert occupants to the presence of methane gas.

1. Active Methane System: The complete designed piping system originating below a building or structure and terminating above the building or structure with a motorized evacuation device to exhaust accumulated gases;

2. Passive Methane System: A non-powered piping system originating below a building and terminating outside of the building using natural air flow for venting accumulated gases.

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I. "Mitigation Plan" means a site-specific plan for the purpose of addressing potential hazards due to the presence of combustible soil gases. The Mitigation Plan shall be approved by City plan check staff or the Development Coordinator prior to construction.

J. "Qualified Professional" means a California Registered Professional Civil Engineer, Petroleum Engineer, or Geologist for general gas mitigation design.

K. "Soil Gas Investigation" means a scientific investigation performed in accordance with Section 18.79.030 reviewed and approved by the Development Coordinator, conducted under the direction of a Qualified Professional, for the purpose of determining the locations and concentrations of combustible soil gas.

L. "Standards" means a set of prescriptive details referenced and included as a part of this Chapter, or in any implementing rules or regulations, including, but not limited to, Building and Safety Bulletins promulgated by the Development Coordinator or designee pursuant to the Chapter.

M. "Subslab Vent Piping" means a minimum of three (3) inch diameter polyvinyl chloride (PVC), high-density polyethylene (HDPE), acrylonitrile butadiene styrene (ABS), or strip composite perforated pipe or equivalent.

N. "Vertical Vent Risers" means a minimum of three (3) inch diameter cast-iron or galvanized steel pipe connecting subslab piping to the atmosphere.

18.79.030 Methane soil gas investigation.

A. Methane soil gas testing shall be required if a property under development meets the criteria set forth in Section 18.79.010. The

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requirement for testing may be waived by the Development Coordinator if the proposed development meets the exemption criteria below:

1. Single- or two (2)-family homes with first floor areas, including garage space(s), patios, and other impervious surfaces connected to the structure, less than five thousand (5,000) square feet shall not require site testing and can default to the methane gas mitigation system(s) design Level I in accordance with Building and Safety Bulletin BU-055;

2. Site testing shall not be required if the methane mitigation system(s) meets design Level III in accordance with Building and Safety Bulletin BU-055.

B. Site soil testing shall be performed after site remediation, in accordance with the Long Beach Oil/Gas Well Abandonment provisions of Chapter 18.78, CalGEM requirements, and/or local site cleanup requirements. Site soil testing shall be performed prior to site grading, or a minimum of thirty (30) days after any site grading commences.

C. Soil testing. Soil testing shall be performed in accordance with the Building and Safety Bulletin BU-055.

18.79.040 Exemptions. Exemptions are as set forth and described in this Chapter and in Building and Safety Bulletin BU-055.

18.79.050 Methane gas mitigation design requirements.

Methane gas mitigation design requirements shall be performed in accordance with the Building and Safety Bulletin BU-055.

18.79.060 Methane gas mitigation components.

The methane gas mitigation components shall be designed and performed in accordance with the Building and Safety Bulletin BU-055.

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18.79.070 Operations and maintenance.

Operations and maintenance shall be performed in accordance with the Building and Safety Bulletin BU-055.

18.79.080 Plan review and inspection fees.

A. Methane gas plan check and inspection fees shall be required for any project with methane mitigation in accordance with the Resolution establishing the City's Master Schedule of Fees and Charges;

B. A separate alarm system plan review and inspection fee shall be assessed for the methane gas Levels II and III systems per Long Beach Fire Code requirements.

18.79.090 Inspections.

All methane mitigation components shall be inspected by the City's inspection staff as referenced in accordance with the Building and Safety Bulletin BU-055.

18.79.100 Qualified professional project certification.

The Qualified Professional shall submit a certification to the City inspector prior to final approval of the grading/building Certificate of Occupancy stating the following:

A. "I am a Qualified Engineer/Geologist in the State of California, and I am knowledgeable in the field of methane gas mitigation systems;

B. The methane gas mitigation system has been constructed and installed under my direct supervision and in accordance with the approved plans (a copy of the "as-built" plans must be provided);

C. The structure is free from methane gas and can be safely occupied" (a copy of the test results shall be provided).

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18.79.110 Covenant and agreement.

Before the building/structure final inspection, a recorded Covenant and Agreement shall be submitted to the Development Coordinator as set forth below:

A. Methane Mitigation Design Requirement Levels I and II. The Owner of the property shall acknowledge for themselves, their heirs, successors in interest, and assigns the following:

1. The building is constructed within the City of Long Beach Methane Gas Zone and/or within three hundred (300) feet from an active oil well, one hundred (100) feet from an abandoned oil well, or one thousand (1,000) feet from a landfill, and is subject to methane gas intrusion from the underlying soil;

2. That a methane gas mitigation system has been designed and approved and is on file with the Development Coordinator and that said system has been correctly installed on the property;

B. Methane Mitigation Design Requirement Level III.

The Owner of the property shall acknowledge for themselves, their heirs, successors in interest, and assigns the following:

1. "The building is constructed within the City of Long Beach Methane Zone and/or within three-hundred (300) feet from an active oil well, one hundred (100) feet from an abandoned oil well, or one-thousand (1,000) feet from a landfill and is subject to methane gas intrusion from the underlying soil;

2. That a methane mitigation system has been designed and approved and is on file with the Development Coordinator, and has been correctly installed on the property;

3. That the property owner will maintain and operate the methane gas mitigation system in accordance with the requirements

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specified in the plans, as approved by the Development Coordinator or Building Official, and Fire Marshal of the City of Long Beach;

4. That an irrevocable consent is granted to the City of Long Beach to permit its authorized employees and representatives to enter onto the premises during regular business hours for the purpose of inspecting and testing for methane intrusion".

18.79.120 Adoption of administrative rules.

The City Manager, or designee, is authorized and directed to promptly adopt administrative rules, which may be in the form of Informational Bulletins, supplemental to the provisions of this Ordinance as necessary or appropriate to implement the Ordinance. The provisions of this Ordinance and the rules adopted by the City Manager, or designee, shall be provided to property owners, developers, potential developers, and other interested members of the public to the widest extent practical. No person shall fail to comply with any such Informational Bulletin, rule or regulation.

Section 2. The City Clerk shall certify to the passage of this ordinance by the City Council and cause it to be posted in three (3) conspicuous places in the City of Long Beach, and it shall take effect on the thirty-first (31st) day after it is approved by the Mayor.

//

//

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CHARLES PARKIN, City Attorney
411 W. Ocean Boulevard, 9th Floor
Long Beach, CA 90802

I hereby certify that the foregoing ordinance was adopted by the City Council of the City of Long Beach at its meeting of _____, 20____, by the following vote:

Ayes: Councilmembers: _____

_____

_____

_____

Noes: Councilmembers: _____

_____

Absent: Councilmembers: _____

_____

Recusal(s): Councilmembers: _____

_____

_____

City Clerk

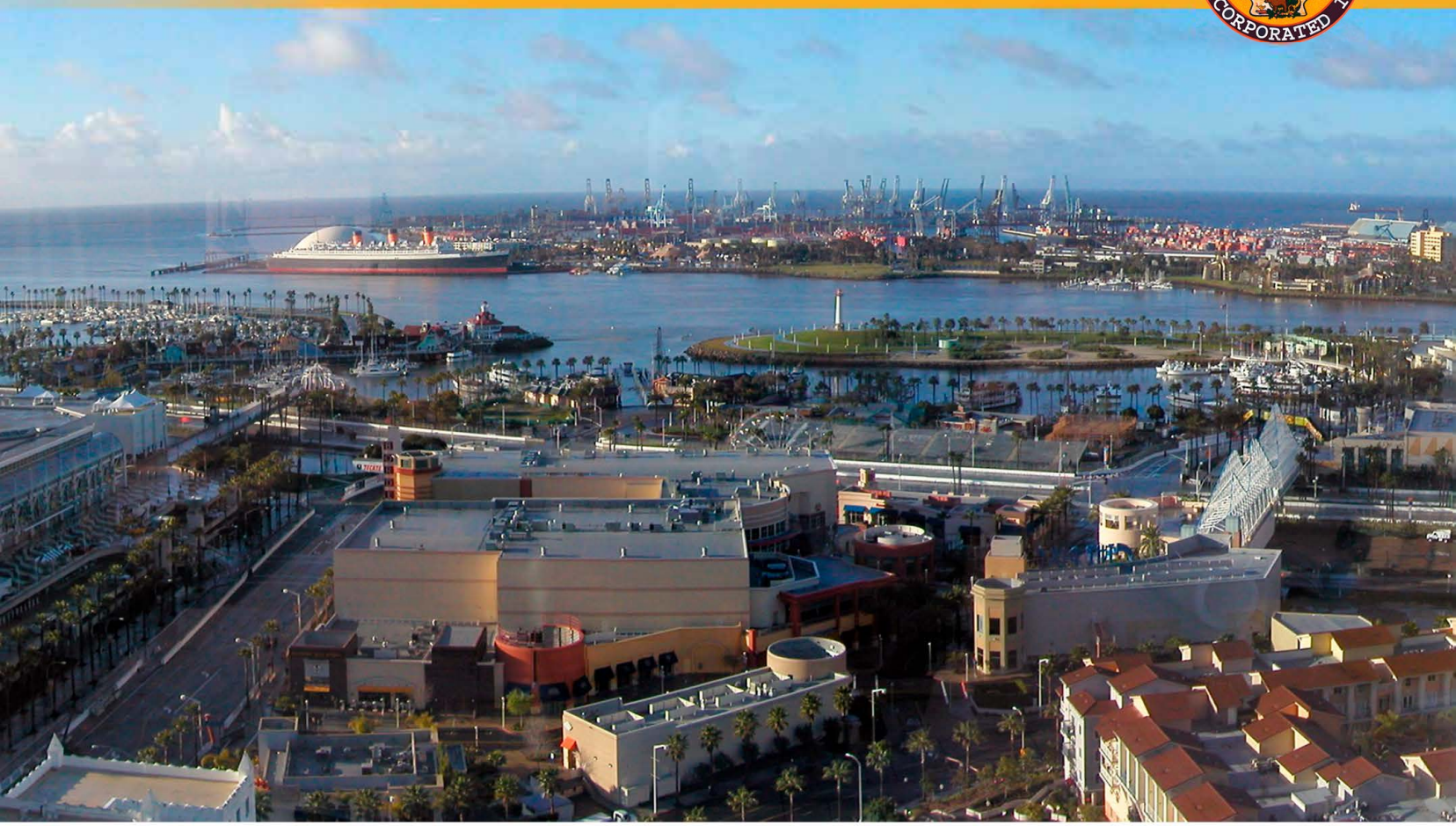
Approved: _____ _____

(Date) Mayor

OFFICE OF THE CITY ATTORNEY
CHARLES PARKIN, City Attorney
411 W. Ocean Boulevard, 9th Floor
Long Beach, CA 90802

Attachment A

May 2020



Long Beach Building Standards Code Amendments

Construction in the Vicinity of Oil Wells/ Methane Gas Mitigation

Initial Study/Negative Declaration

Prepared for:

City of Long Beach

Prepared by:

Michael Baker INTERNATIONAL

FINAL
INITIAL STUDY/NEGATIVE DECLARATION

Long Beach Building Standards Code Amendments – Construction in the Vicinity of Oil Wells/Methane Gas Mitigation

LEAD AGENCY:
City of Long Beach
411 West Ocean Boulevard, 3rd Floor
Long Beach, California 90802
Contact: Ms. Amy L. Harbin, AICP
562.570.6872

PREPARED BY:
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Santa Ana, California 92707
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949.472.3505

May 2020

JN 177490

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1.0 INTRODUCTION

The Long Beach Building Standards Code Amendments – Construction in the Vicinity of Oil Wells and Methane Gas Mitigation (herein referenced as the "project") proposes to amend Title 18 of the *Long Beach Municipal Code* by adding Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*.

Following a preliminary review of the proposed project, the City of Long Beach (City) has determined that it is subject to the guidelines and regulations of the California Environmental Quality Act (CEQA). This Initial Study/Negative Declaration addresses the direct, indirect, and cumulative environmental effects of the project, as proposed.

1.1 STATUTORY AUTHORITY AND REQUIREMENTS

In accordance with CEQA (Public Resources Code Sections 21000-21177) and pursuant to Section 15063 of Title 14 of the California Code of Regulations (CCR), the City of Long Beach, acting in the capacity of Lead Agency, is required to undertake the preparation of an Initial Study to determine whether the proposed project would have a significant environmental impact. If the Lead Agency finds that there is no evidence that the project, either as proposed or as modified to include the mitigation measures identified in the Initial Study, may cause a significant effect on the environment, the Lead Agency shall find that the proposed project would not have a significant effect on the environment and shall prepare a Negative Declaration (or Mitigated Negative Declaration) for that project. Such determination can be made only if "there is no substantial evidence in light of the whole record before the Lead Agency" that such impacts may occur (Section 21080, Public Resources Code).

The environmental documentation, which is ultimately approved and/or certified by the City in accordance with CEQA, is intended as an informational document undertaken to provide an environmental basis for subsequent discretionary actions upon the project. The resulting documentation is not, however, a policy document and its approval and/or certification neither presupposes nor mandates any actions on the part of those agencies from whom permits and other discretionary approvals would be required.

1.2 PURPOSE

Section 15063 of the CEQA Guidelines identifies specific disclosure requirements for inclusion in an Initial Study. Pursuant to those requirements, an Initial Study shall include:

- A description of the project, including the location of the project;
- Identification of the environmental setting;
- Identification of environmental effects by use of a checklist, matrix, or other method, provided that entries on a checklist or other form are briefly explained to indicate that there is some evidence to support the entries;
- Discussion of ways to mitigate significant effects identified, if any;
- Examination of whether the project is compatible with existing zoning, plans, and other applicable land use controls; and
- The name(s) of the person(s) who prepared or participated in the preparation of the Initial Study.

1.3 CONSULTATION

As soon as the Lead Agency (in this case, the City of Long Beach) has determined that an Initial Study would be required for the project, the Lead Agency is directed to consult informally with all Responsible Agencies and Trustee Agencies that are responsible for resources affected by the project, in order to obtain the recommendations of those

agencies on the environmental documentation to be prepared for the project. Following receipt of any written comments from those agencies, the City will consider their recommendations when formulating the preliminary findings. Following completion of this Initial Study, the City will initiate formal consultation with these and other governmental agencies as required under CEQA and its implementing guidelines.

1.4 INCORPORATION BY REFERENCE

The following documents were utilized during preparation of this Initial Study and are incorporated into this document by reference. The documents are available for review at the City of Long Beach Development Services Department, located at 411 West Ocean Boulevard, 3rd Floor, Long Beach, California 90802.

- *City of Long Beach General Plan* (updated December 2019). The purpose of the *City of Long Beach General Plan* (General Plan) is to provide a general, comprehensive, and long-range guide for community decision-making. The General Plan consists of the following elements, adopted and/or updated on various dates: Land Use (2019); Urban Design (2019); Housing (2014); Mobility Element (2013); Historic Preservation (2010); Open Space and Recreation (2002); Public Safety (2002); Air Quality (1996); Seismic Safety (1988); Local Coastal Program (1980); Noise (1975); and Conservation (1973). The individual elements identify goals and policies for existing and future conditions within the City.

- *Long Beach Municipal Code* (codified through Ordinance No. ORD-20-0004, enacted January 21, 2020). The *Long Beach Municipal Code* (LBMC) consists of regulatory, penal, and administrative ordinances of the City. It is the method the City uses to implement control of land uses, in accordance with the General Plan goals and policies. Title 18, *Long Beach Building Standards Code*, of the LBMC establishes requirements to safeguard the public health, safety, and welfare through building standards related to structural strength, sanitation, light and ventilation, energy conservation, emergency operations, and utility systems, among others. Title 21, *Zoning*, identifies land uses permitted and prohibited according to the zoning designation of particular parcels. The purpose of the zoning regulations within the LBMC is to promote and preserve the public health, safety, comfort, convenience, prosperity, and general welfare of the people of Long Beach.

2.0 PROJECT DESCRIPTION

2.1 PROJECT LOCATION

The City of Long Beach (City) is located in the southern portion of the County of Los Angeles (County); refer to Exhibit 2-1, *Regional Vicinity*. The City encompasses 50 square miles and is bordered by the cities of Compton, Paramount, and Bellflower, and the unincorporated community of Rancho Dominguez to the north; the cities of Lakewood, Hawaiian Gardens, Cypress, Los Alamitos, and Seal Beach, and the unincorporated community of Rossmoor to the east; the Pacific Ocean to the south; and the cities of Carson and Los Angeles to the west; refer to Exhibit 2-2, *Site Vicinity*. In addition, the City of Signal Hill is completely surrounded by the City. Regional access to Long Beach is provided by a number of freeways, including Interstates 710, 605, and 405, and State Routes 1, 22, and 91.

2.2 ENVIRONMENTAL SETTING

The City is located in a highly urbanized area of Los Angeles County and is almost entirely developed. The majority of Long Beach is occupied by residential uses of varying densities (approximately 44 percent). The remaining land uses characterizing the City include commercial, office, industrial, open space and recreational, and regional-serving uses (e.g., Port of Long Beach, Long Beach Airport, California State University Long Beach, and the Long Beach Memorial Medical Center).

The *Long Beach Municipal Code* (LBMC), codified through Ordinance No. ORD-20-0004, enacted January 21, 2020, consists of regulatory, penal, and administrative ordinances of the City. The City utilizes the LBMC to implement control of land uses, in accordance with the *City of Long Beach General Plan* (General Plan) goals and policies.

LBMC Title 12, *Long Beach Oil Code* (Oil Code), regulates oil drilling and the production of petroleum to ensure the activities are conducted in conformance with the California Fire Code and regulations of the California Geologic Energy Management Division, and in harmony with other land uses. The Oil Code is divided into chapters that, among others, detail oil operating areas within the City; required permits; development standards; and abandonment procedures. Currently, the City does not have any LBMC regulations related to construction activities in the vicinity of oil/gas wells or methane mitigation requirements associated with such activities.

Title 18, *Long Beach Building Standards Code*, of the LBMC establishes requirements to safeguard the public health, safety, and welfare through building standards related to structural strength, sanitation, light and ventilation, energy conservation, emergency operations, and utility systems, among others.

2.3 PROJECT BACKGROUND

The main goal of the California Geologic Energy Management Division (CalGEM), formerly known as the California Department of Conservation Division of Oil, Gas, and Geothermal Resources (DOGGR), is to protect the public and environment in its oversight of the oil, natural gas, and geothermal industries in California. CalGEM regulates the drilling, operation, and permanent closure of energy resource wells and also regulates certain pipeline and facilities associated with production and injection. In 1989, CalGEM developed the Construction Site Plan Review Program (CSPRP), which aided local permitting agencies in identifying and reviewing the status of oil or gas wells located near or beneath proposed development. Before issuing building or grading permits, local permitting agencies review and implement CalGEM's pre-construction well requirements, which can include excavating wells, testing for leakage, and/or installing plugs and vents.

NOT TO SCALE

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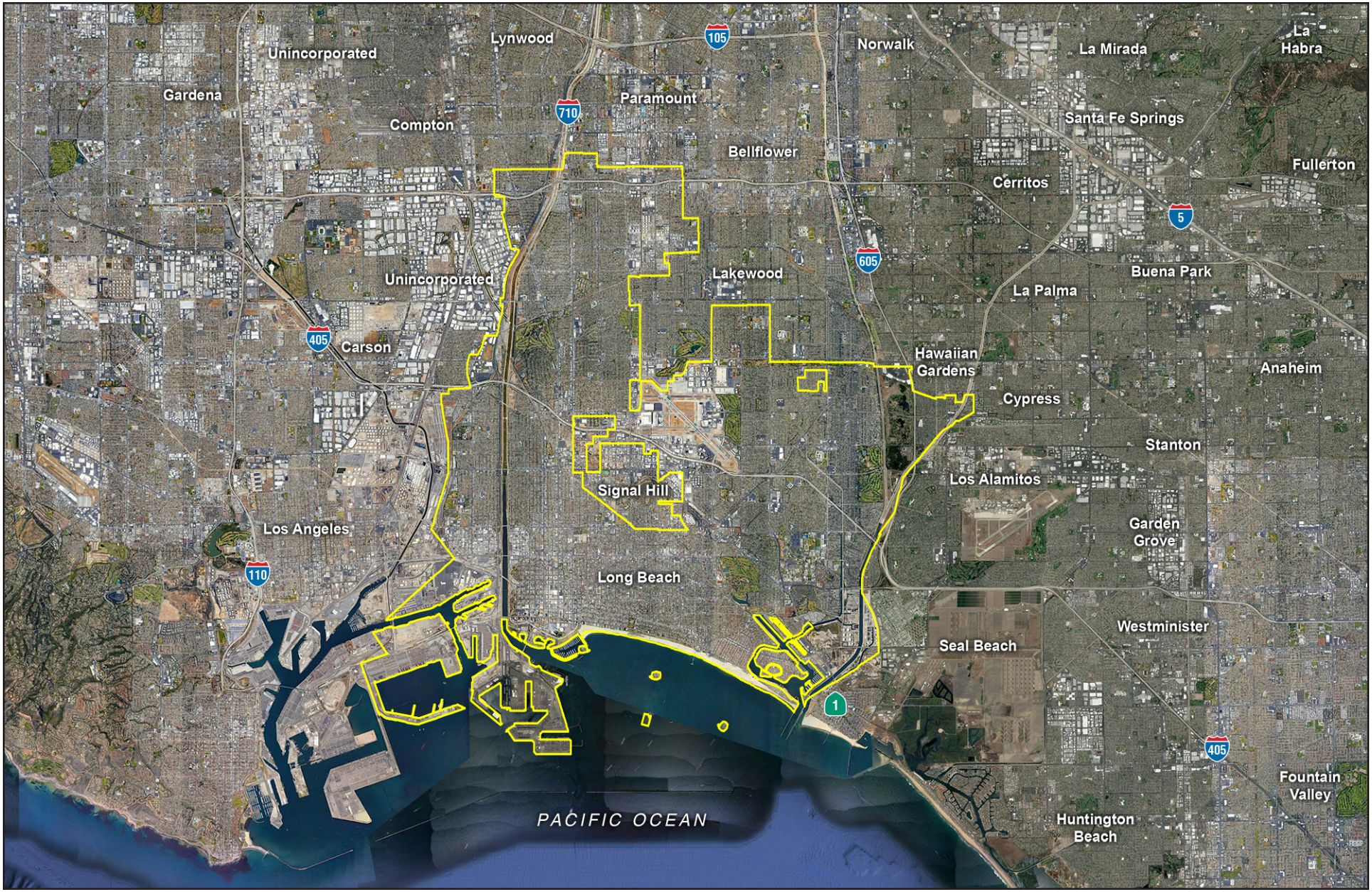
LONG BEACH BUILDING STANDARDS CODE AMENDMENTS
CONSTRUCTION IN THE VICINITY OF OIL WELLS/METHANE GAS MITIGATION

Regional Vicinity

Exhibit 2-1



NOT TO SCALE

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Project Boundary

05/20 JN 177490

LONG BEACH BUILDING STANDARDS CODE AMENDMENTS
CONSTRUCTION IN THE VICINITY OF OIL WELLS/METHANE GAS MITIGATION

Site Vicinity

Exhibit 2-2

The City's Oil Code regulates the drilling and re-drilling for and the production of petroleum so that these activities may be conducted in conformance with the California Fire Code and CalGEM regulations, in harmony with other land uses, and to minimize the economic effect of lessening land values in areas of drilling and petroleum production. As detailed in the General Plan Conservation Element, oil-related operations have occurred in Long Beach since 1936. Oil deposits are abundant in the City's tidelands area, primarily the Wilmington Oil Field, and has historically been a major source of revenue for the City. The Wilmington Oil Field is the third largest field in the contiguous United States with an ultimate recovery estimated at three billion barrels of oil. According to CalGEM, there are a total of 2,922 wells in the Long Beach area, of which 2,198 are plugged and abandoned.[1]

Long Beach is primarily urbanized and built out; therefore, much of the City is built around oil/gas wells, landfills, and other methane-producing sources. The City has received numerous requests from potential developers and property owners regarding development of habitable and non-habitable structures in the vicinity of existing oil/gas wells. Methane leaks from abandoned wells, pipelines, or processing equipment can occur and result in unknowingly hazardous conditions for adjacent uses while substantially increasing greenhouse gas emissions. The current CalGEM well abandonment standards prohibit development on sites with previously abandoned wells in the City. Additionally, the City does not have any adopted methane gas mitigation standards in the LBMC. Several nearby jurisdictions, including the cities of Los Angeles, Signal Hill, Huntington Beach, Santa Fe Springs, Brea, and the counties of Los Angeles and Orange have developed standards and guidelines to address construction near oil wells and/or above oil fields. Additionally, these jurisdictions have been successful in planning and implementing development on and near potential sources of methane gas.

Therefore, in May 2018, the City's Building and Safety Bureau retained an environmental and geotechnical engineering firm to assist the City in developing guidelines and standards to be used as the basis for City ordinances related to construction in the vicinity of oil wells and methane gas mitigation.

2.4 PROJECT CHARACTERISTICS

In the City, the authority to enforce building construction regulations, oversee permitting of new oil/gas wells, annual permitting, and abandonment of existing oil/gas well lies with the City's Building and Safety Bureau. Specifically, the Oil Code Enforcement Section (OCES) of the Building and Safety Bureau regulates oil and gas wells. The Long Beach Building Standards Code Amendments – Construction in the Vicinity of Oil Wells and Methane Gas Mitigation (project) proposes to amend Title 18 of the LBMC by adding Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*.

CHAPTER 18.78, *CONSTRUCTION IN THE VICINITY OF OIL WELLS*

This new chapter would apply to construction activities in the vicinity of oil/gas wells with the exception of minor additions or modifications to existing structures. According to the proposed chapter, the permittee would be required to complete and submit a Construction Site Well Review Application to CalGEM, which would trigger the well review process. A Well Safety Evaluation would then be submitted to the OCES for review that would include details on the proposed well abandonment, future accessibility, above-well mitigation, and long-term safety evaluation.

Permittees seeking approval under the City's oil well abandonment equivalency standard[2] would be required to perform leak tests on wells within a subject property under OCES observation. Following successful leak testing(s), installation of above-well mitigation (e.g., vent cones) would be required in accordance with the proposed chapter. Upon

[1] California Geologic Energy Management Division, *Well Search: Los Angeles County, Long Beach Field*, https://secure.conservation.ca.gov/WellSearch, accessed February 19, 2020.

[2] Permittees that are unable to abandon a well under CalGEM standards can utilize the City's oil well abandonment equivalency standards as detailed in the proposed chapter; refer to Appendix A for the full text.

completion of vent cone installation(s), the permittee would then be required to file an Indemnity Agreement and a Declaration of Covenant for notification to future site occupants.

The City would then issue a Well Abandonment Approval Notice, which would permit development to occur. Structures developed in the vicinity of abandoned oil wells would also require methane mitigation in accordance with the proposed LBMC Chapter 18.79, *Methane Gas Mitigation*, as detailed below. Refer to Appendix A, *Proposed Ordinances*, for the full text of the proposed chapter.

CHAPTER 18.79, *METHANE GAS MITIGATION*

The proposed methane gas mitigation chapter details the applicability of methane mitigation requirements, definitions, methane soil gas investigation, exemptions, site design levels, methane mitigation components, operations and maintenance, plan review and inspections, and post construction protocols, among others.

The proposed chapter is applicable to sites above petroleum-bearing formations and structures within 300 feet of an active, or 100 feet of an abandoned oil well. Sites within 1,000 feet of a landfill are also required to conduct methane mitigation; however, those requirements are in accordance with California Code of Regulations Title 27. The City may also require soil gas investigation for new development on properties formally containing storage tanks or surface impoundments containing petroleum products.

Based on the soil gas testing results, the proper methane mitigation site design level (i.e., I, II, or III with increasing requirements from I to III) would be identified. Proposed components of methane mitigation may include a gas membrane barrier; perforated horizontal pipes; vent risers; signage; gas detection system; alarm system; control panel; mechanical sub slab extraction; trench dam; conduit or cable seal fittings; heating, ventilation, and air conditioning (HVAC) controls; and pavement venting. Preparation of an Emergency/Contingency Plan and Operation, Monitoring, and Maintenance Plan would also be required.

Plan review, testing, and inspections would be required and performed by City inspection staff. Upon final building inspection, the permittee/property owner would file a covenant and agreement with varying degrees of specificity based on the chosen site design level (i.e., I, II, or III).

With the development of the proposed chapter, a new Methane Zone Geographic Information System (GIS) layer based on existing GIS layers for oil/gas wells, oil fields, and landfill areas, has been developed. The Methane Zone map can be utilized by City staff, developers, and property owners in identifying properties that may be subject to the proposed chapter. If a project site is located within a Methane Zone, the developer/property owner would be required to follow the standards detailed in the proposed chapter prior to any construction activities. Refer to Appendix A for the full text of the proposed chapter.

2.5 PHASING

Should the City approve the project, the proposed LBMC amendments would become effective 30 days after the second ordinance reading before the Long Beach City Council. Final project approval is anticipated to occur in mid-2020.

2.6 PERMITS AND APPROVALS

The proposed project would require the following permits and approvals from the City of Long Beach prior to implementation.

- Adoption of Negative Declaration 02-20;

- Approval of an Ordinance associated with the amendments to LBMC Title 18 (Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*).

3.0 INITIAL STUDY CHECKLIST

3.1 BACKGROUND

1. Project Title: Long Beach Building Standards Code Amendments – Construction in the Vicinity of Oil Wells and Methane Gas Mitigation
2. Lead Agency Name and Address: City of Long Beach Development Services Department 411 West Ocean Boulevard, 3rd Floor Long Beach, CA 90802
3. Contact Person and Phone Number: Ms. Amy L. Harbin, AICP Planner 562.670.6872
4. Project Location: The project site is the entire City of Long Beach (City), which is located in the southern portion of the County of Los Angeles. Regional access to Long Beach is provided by a number of freeways, including Interstates 710, 605, and 405, and State Routes 1, 22, and 91.
5. Project Sponsor's Name and Address: City of Long Beach Development Services Department 411 West Ocean Boulevard, 3rd Floor Long Beach, CA 90802
6. General Plan Designation: The proposed project would apply to all General Plan land use designations in the City.
7. Zoning: The proposed project would apply to all zoning districts in the City.
8. Description of the Project: The project proposes to amend Title 18 of the *Long Beach Municipal Code* (LBMC) by adding Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*. Additional details regarding the proposed project are provided in Section 2.4, *Project Characteristics*.

9. Surrounding Land Uses and Setting:

The City is bordered by the cities of Compton, Paramount, and Bellflower, and the unincorporated community of Rancho Dominguez to the north; the cities of Lakewood, Hawaiian Gardens, Cypress, Los Alamitos, and Seal Beach, and the unincorporated community of Rossmoor to the east; the Pacific Ocean to the south; and the cities of Carson and Los Angeles to the west. In addition, the City of Signal Hill is completely surrounded by the City. Long Beach and its neighboring cities are fully urbanized and characterized by moderate to dense commercial, industrial, and residential development.

10. Other public agencies whose approval is required (e.g., permits, financing approval or participation agreement).

Refer to Section 2.6, *Permits and Approvals*, for a description of the permits and approvals anticipated to be required for the project.

3.2 ENVIRONMENTAL FACTORS POTENTIALLY AFFECTED

The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a "Potentially Significant Impact" as indicated on the following pages.

☐	Aesthetics	☐	Agriculture and Forestry	☐	Air Quality
☐	Biological Resources	☐	Cultural Resources	☐	Energy
☐	Geology and Soils	☐	Greenhouse Gas Emissions	☐	Hazards and Hazardous Materials
☐	Hydrology and Water Quality	☐	Land Use and Planning	☐	Mineral Resources
☐	Noise	☐	Population and Housing	☐	Public Services
☐	Recreation	☐	Transportation	☐	Tribal Cultural Resources
☐	Utilities and Service Systems	☐	Wildfire	☐	Mandatory Findings of Significance

3.3 LEAD AGENCY DETERMINATION

On the basis of this initial evaluation:

The City of Long Beach finds that the proposed use COULD NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared. ✓

The City of Long Beach finds that although the proposal could have a significant effect on the environment, there will not be a significant effect in this case because the mitigation measures described in Section 4.0 have been added. A MITIGATED NEGATIVE DECLARATION will be prepared. _____

The City of Long Beach finds that the proposal MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required. _____

The City of Long Beach finds that the proposal MAY have a significant effect(s) on the environment, but at least one effect 1) has been adequately analyzed in an earlier document pursuant to applicable legal standards, and 2) has been addressed by mitigation measures based on the earlier analysis as described on attached sheets, if the effect is a "potentially significant impact" or "potentially significant unless mitigated." An ENVIRONMENTAL IMPACT REPORT is required, but it must analyze only the effects that remain to be addressed. _____

Signature — City of Long Beach (Agency)

Amy L. Harbin, AICP, Planner (Printed Name) — 5/19/2020 (Date)

3.4 EVALUATION OF ENVIRONMENTAL IMPACTS

This section analyzes the potential environmental impacts associated with the proposed project. The issue areas evaluated in this Initial Study include:

- Aesthetics
- Agriculture and Forestry Resources
- Air Quality
- Biological Resources
- Cultural Resources
- Energy
- Geology and Soils
- Greenhouse Gas Emissions
- Hazards and Hazardous Materials
- Hydrology and Water Quality
- Land Use and Planning
- Mineral Resources
- Noise
- Population and Housing
- Public Services
- Recreation
- Transportation
- Tribal Cultural Resources
- Utilities and Service Systems
- Wildfire
- Mandatory Findings of Significance

The environmental analysis in this section is patterned after the Initial Study Checklist recommended by the CEQA Guidelines and used by the City of Long Beach in its environmental review process. For the preliminary environmental assessment undertaken as part of this Initial Study's preparation, a determination that there is a potential for significant effects indicates the need to more fully analyze the development's impacts and to identify mitigation.

For the evaluation of potential impacts, the questions in the Initial Study Checklist are stated and an answer is provided according to the analysis undertaken as part of the Initial Study. The analysis considers the long-term, direct, indirect, and cumulative impacts of the development. To each question, there are four possible responses:

- *No Impact*. The project would not have any measurable environmental impact on the environment.

- *Less Than Significant Impact*. The project would have the potential for impacting the environment, although this impact would be below established thresholds that are considered to be significant.

- *Less Than Significant Impact With Mitigation Incorporated*. The project would have the potential to generate impacts which may be considered as a significant effect on the environment, although mitigation measures or changes to the project can reduce these impacts to levels that are less than significant.

- *Potentially Significant Impact*. The project would have impacts which are considered significant, and additional analysis is required to identify mitigation measures that could reduce these impacts to less than significant levels.

Where potential impacts are anticipated to be significant, mitigation measures will be required, so that impacts may be avoided or reduced to insignificant levels.

4.0 ENVIRONMENTAL ANALYSIS

The following is a discussion of potential project impacts as identified in the Initial Study/Environmental Checklist. Explanations are provided for each item.

4.1 AESTHETICS

Except as provided in Public Resources Code Section 21099, would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Have a substantial adverse effect on a scenic vista?				✓
b. Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?				✓
c. In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?				✓
d. Create a new source of substantial light or glare, which would adversely affect day or nighttime views in the area?				✓

a) Have a substantial adverse effect on a scenic vista?

No Impact. The *City of Long Beach General Plan* (General Plan) Mobility Element designates the segment of Ocean Boulevard from Nimitz Road on the west to State Route 1 (SR-1; Pacific Coast Highway) on the east as a City-designated scenic route. In addition, the General Plan Urban Design Element states that the City's scenic route system will be expanded to include Ocean Boulevard on the Belmont Peninsula, the Promenade in downtown Long Beach, the Los Angeles River and San Gabriel River corridors, Appian Way along the Colorado Lagoon, Marine Stadium, Studebaker Road, the approach to Rancho Los Cerritos, and the entire stretch of SR-1 through the City. These roadways are planned to be designated scenic highways by 2030.

The proposed project would add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the *Long Beach Municipal Code* (LBMC). These chapters would provide development standards, mitigation, and procedures to ensure public safety and allow for future development in the vicinity of oil wells. These standards proposed to be added to the LBMC are not anticipated to result in any changes in development standards or design features that would adversely affect scenic vistas. The proposed LBMC amendments represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. Nevertheless, all future development subject to the proposed LBMC amendments would similarly be subject to design, zoning, and architectural review pursuant to City standards. As such, the project would not have a substantial adverse effect on scenic vistas in the City; no impacts would occur.

Mitigation Measures: No mitigation is required.

b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?

No Impact. There are no officially-designated State scenic highways in Long Beach. The closest Officially Designated State Scenic Highway is State Route 2, located approximately 23 miles to the north near the entrance to the Angeles National Forest. The nearest eligible State scenic highway (not officially designated) is a segment of SR-1 from SR-22 on the north to the southeastern City limits on the south, located in the southeastern portion of the City.[1]

As stated above, the proposed LBMC amendments related to construction in the vicinity of oil wells and methane gas mitigation, represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. Nevertheless, all future development subject to the proposed LBMC amendments would be subject to design and zoning review pursuant to City standards, to ensure that scenic resources are not substantially affected. Project implementation would not damage any scenic resource (i.e., trees, rock outcroppings, or historic buildings) within the viewshed of a State scenic highway. No impacts would result in this regard.

Mitigation Measures: No mitigation is required.

c) In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?

No Impact. The City is highly urbanized and built out with a variety of land uses, including single- and multi-family neighborhoods, transit-oriented and mixed-use developments, commercial corridors, industrial areas, and downtown and waterfront uses. The proposed LBMC amendments represent standards for future applicable projects, therefore, no development or structures are proposed that would have a potential to result in environmental impacts. These standards proposed to be added to the LBMC are not anticipated to result in any changes in development standards or design features that would degrade visual character, quality, or public views. Additionally, the proposed amendments would not conflict with standards detailed in LBMC Title 21, *Zoning*. As such, no impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?

No Impact. There are two primary sources of light: light emanating from building interiors that pass through windows and light from exterior sources (i.e., street lighting, parking lot lighting, building illumination, security lighting, and landscape lighting). Depending upon the location of the light source and its proximity to adjacent light sensitive uses, light introduction can be a nuisance, affecting adjacent areas and diminishing the view of the clear night sky.

The proposed amendments to LBMC Title 18, *Long Beach Building Standards Code*, represent standards for future applicable projects, therefore, no development or structures are proposed that would have a potential to result in environmental impacts. Future developments subject to the LBMC amendments analyzed herein would be subject to design, lighting, and/or photometric review in accordance with City standards. The proposed project would not create a new source of substantial light or glare that could adversely affect day or nighttime views in the area. No impacts would occur.

[1] California Department of Transportation, *California Scenic Highway Mapping System*, http://www.dot.ca.gov/hq/LandArch/16_livability/scenic_highways/, accessed March 4, 2020.

Mitigation Measures: No mitigation is required.

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4.2 AGRICULTURE AND FORESTRY RESOURCES

In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Department of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection regarding the state's inventory of forest land, including the Forest and Range Assessment Project and the Forest Legacy Assessment project; and forest carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board. Would the project:	**Potentially Significant Impact**	**Less Than Significant Impact With Mitigation Incorporated**	**Less Than Significant Impact**	**No Impact**
a. Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?				✓
b. Conflict with existing zoning for agricultural use, or a Williamson Act contract?				✓
c. Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?				✓
d. Result in the loss of forest land or conversion of forest land to non-forest use?				✓
e. Involve other changes in the existing environment, which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?				✓

a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?

No Impact. The City is urbanized and predominantly built out. Based on the California Department of Conservation *Important Farmland In California 2016 Map*, there are no areas within the City designated as Prime Farmland, Unique Farmland, or Farmland of Statewide Importance.[1] The City and surrounding areas are designated urban and built-up lands. As such, no impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

[1] California Department of Conservation Farmland Mapping and Monitoring Program, *California Important Farmland Finder,* https://maps.conservation.ca.gov/dlrp/ciff/, accessed March 4, 2020.

b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?

No Impact. According to the *City of Long Beach Zoning Districts Map*, there are no areas within the City zoned for agricultural use.[2] Additionally, there are no lands within Long Beach under a Williamson Act contract.[3] Thus, no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code section 12220(g)), timberland (as defined by Public Resources Code section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?

No Impact. Refer to Responses 4.2(a) and 4.2(b). No zoning for forest land or timberland exists within the project site, and no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

d) Result in the loss of forest land or conversion of forest land to non-forest use?

No Impact. Refer to Responses 4.2(b) and 4.2(c). No impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

e) Involve other changes in the existing environment, which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?

No Impact. As stated above in Responses 4.2(a) through 4.2(c), the City is urbanized and void of any agricultural or forest resources. Thus, there is no potential for the conversion of farmland or forest resources and no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

[2] City of Long Beach, *City of Long Beach Zoning Districts*, http://www.longbeach.gov/globalassets/lbds/media-library/documents/planning/maps/zoning-maps/50-by-50-zoning-map-2018-september, accessed March 4, 2020.
[3] California Department of Conservation Division of Land Resource Protection, *Los Angeles County Williamson Act FY 2015/2016*, 2016.

4.3 AIR QUALITY

Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations. Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Conflict with or obstruct implementation of the applicable air quality plan?				✓
b. Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable Federal or State ambient air quality standard?				✓
c. Expose sensitive receptors to substantial pollutant concentrations?				✓
d. Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?				✓

a) Conflict with or obstruct implementation of the applicable air quality plan?

No Impact. The United States Environmental Protection Agency (USEPA) is responsible for setting and enforcing the National Air Ambient Air Quality Standards (NAAQS) for ozone (O_3), carbon monoxide (CO), nitrogen dioxide (NO_2), sulfur dioxide (SO_2), particulate matter 10 microns or less in diameter (PM_{10}), particulate matter 2.5 microns or less in diameter ($PM_{2.5}$), and lead, under the Federal Clean Air Act (CAA). The USEPA also establishes emission standards for on-road vehicles and off-road engines. The CAA forms the basis for national pollution control and delegates enforcement of the Federal standards to the states. In California, the California Air Resources Board (CARB) and the local air agencies have the shared responsibility for enforcing air pollution regulations, with the local agencies having primary responsibility for regulating stationary emission sources. The City is located within the South Coast Air Basin (SCAB). The SCAB is composed of Orange County and the urban, non-desert portions of Los Angeles, Riverside, and San Bernardino counties. The South Coast Air Quality Management District (SCAQMD) is the local agency responsible for ensuring Federal and State ambient air quality standards are attained and maintained in the SCAB.

Attainment of the NAAQS and California Ambient Air Quality Standards (CAAQS), set by CARB, is characterized via a network of ambient air quality monitoring stations, located in the SCAB. Pollutants monitored include O_3, PM, CO, NO_2, and SO_2. Table 4.3-1, *South Coast Air Basin Attainment Status*, summarizes the Federal and State attainment status of criteria pollutants for the SCAB based on the NAAQS and CAAQS, respectively.

In areas where the NAAQS are not attained (Federal nonattainment areas), the CAA requires preparation of a State Implementation Plan (SIP) detailing how the State will attain the NAAQS within mandated timeframes. In response to this requirement, local air quality agencies, such as SCAQMD, in collaboration with other agencies, such as CARB and the Southern California Association of Governments, prepare Air Quality Management Plans (AQMPs) designed to bring the area into attainment with Federal requirements and/or to incorporate the latest technical planning information. The AQMP for each nonattainment area is then incorporated into the SIP, which is submitted by CARB to USEPA for approval.

Table 4.3-1
South Coast Air Basin Attainment Status

Pollutant	Federal	State
O_3 (8-hr standard)	Nonattainment (Extreme)	Nonattainment
PM_{10}	Attainment (Maintenance)	Nonattainment
$PM_{2.5}$ (24-hr standard)	Nonattainment (Serious)	Nonattainment
$PM_{2.5}$ (annual standard)	Nonattainment (Moderate)	Nonattainment
CO	Attainment (Maintenance)	Attainment
NO_2	Attainment (Maintenance)	Attainment
SO_2	Attainment (Unclassifiable)	Attainment

Source: California Air Resources Board and U.S. Environmental Protection Agency, *Ambient Air Quality Standards,* http://www.arb.ca.gov/research/aaqs/aaqs2.pdf, May 4, 2016.

The SCAQMD prepared AQMPs in 1997, 2003, 2007, 2012 and most recently in 2016. Each iteration of the AQMP serves as an update to the previous AQMP. The 2016 AQMP was adopted and submitted to the USEPA in March 2017. The 2016 AQMP focuses on attainment of the O_3 and $PM_{2.5}$ NAAQS through the reduction of O_3 and $PM_{2.5}$ precursor NO_x, as well as through direct control of $PM_{2.5}$. The 2016 AQMP identifies control measures and strategies to demonstrate the region's attainment of the revoked 1997 8-hour ozone NAAQS (80 parts per billion [ppb]) by 2024; the 2008 8-hour O_3 standard (75 ppb) by 2032; the 2012 annual $PM_{2.5}$ standard (12 micrograms per cubic meter [ug/m^3]) by 2025; the 2006 24-hour $PM_{2.5}$ standard (35 ug/m^3) by 2019; and the revoked 1979 1-hour O_3 standard (120 ppb) by 2023.

Each AQMP proposes attainment strategies designed to bring the SCAB into attainment of the CAAQS and NAAQS. AQMP attainment strategies and control measures include mobile source control measures and clean fuel programs and are enforced at the State and Federal levels on engine manufacturers and petroleum refiners and retailers. SCAQMD also adopts AQMP control measures into the SCAQMD rules and regulations, which are then used to regulate sources of air pollution in the SCAB. Therefore, compliance with these requirements would ensure that the proposed project would not obstruct implementation of the AQMP.

As discussed under Response 4.3(b), the project would not directly result in criteria pollutant emissions. The proposed LBMC amendments include development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. Specifically, Chapter 18.79, *Methane Gas Mitigation*, would require methane gas mitigation, including soil gas testing, leak testing, and site plan review, among others, to ensure methane gas emissions do not leak from abandoned oil/gas wells prior to new construction occurring in the vicinity. This would help reduce previously unknown methane gas leaks in the City and improve overall air quality in the SCAB region. Overall, the proposed amendments represent standards for future applicable projects, therefore, no development or structures are proposed that would have the potential to result in environmental impacts. Additionally, the project would not increase or alter potential development potential within the City. Nevertheless, all future development subject to the proposed LBMC amendments would be subject to AQMP consistency review according to City and SCAQMD standards. As such, the project would not cause or contribute to an exceedance of NAAQS or CAAQS and would not conflict with the 2016 AQMP efforts to achieve attainment status for O_3, $PM_{2.5}$, and PM_{10}. No impact would occur in this regard.

Mitigation Measures: No mitigation is required.

b) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable Federal or State ambient air quality standard?

No Impact. As stated above, the proposed LBMC amendments related to construction in the vicinity of oil wells and methane gas mitigation represent standards for future applicable projects. The project does not involve any land development or construction activities that could generate short- or long-term air emissions. The standards proposed

to be added to the LBMC are not anticipated to result in any changes in development standards, design features, or land use controls that would result in any increases in air pollutant emissions. Therefore, the project would not result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable Federal or State ambient air quality standard. All future development subject to the proposed LBMC amendments would still be subject to criteria air pollutant review according to City and SCAQMD standards. No impact would occur in this regard.

Mitigation Measures: No mitigation is required.

c) Expose sensitive receptors to substantial pollutant concentrations?

No Impact. As discussed above, the proposed project would not generate air emissions and would be consistent with the 2016 AQMP. Therefore, the project would not expose sensitive receptors to substantial pollutant concentrations, and no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

d) Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?

No Impact. According to the SCAQMD *CEQA Air Quality Handbook*, land uses associated with odor complaints typically include agricultural uses, wastewater treatment plants, food processing plants, chemical plants, composting, refineries, landfills, dairies, and fiberglass molding. As discussed above, the project would not directly result in air emissions from land development or construction activities. All future development subject to the proposed LBMC amendments would be subject to review to determine if adverse odor impacts may occur. As such, the project would not generate odors or other emissions (such as those leading to odors) and no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

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4.4 BIOLOGICAL RESOURCES

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?				✓
b. Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?				✓
c. Have a substantial adverse effect on State or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?				✓
d. Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?				✓
e. Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?				✓
f. Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?				✓

a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?

No Impact. The City is urbanized and mostly built out with wildlife habitat generally limited to parks, nature preserves, and water body areas. The proposed project would add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. Overall, the proposed LBMC amendments represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. Nevertheless, all future development subject to the proposed LBMC amendments would also be reviewed for potential impacts to candidate, sensitive, or special-status species regulated by the California Department of Fish and Wildlife and U.S. Fish and Wildlife Service. As such, no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?

No Impact. As stated above, the proposed LBMC amendments related to construction in the vicinity of oil wells and methane gas mitigation represent standards for future projects, and no development or structures are proposed that would have a potential to result in environmental impacts. The City is urbanized and mostly built out with wildlife habitat generally limited to parks, nature preserves, and water body areas. The project would not increase development potential within the City, or increase the potential for any development to occur within areas occupied by sensitive natural communities. Therefore, implementation of the project would have no impacts to riparian habitat or sensitive natural communities within Long Beach. No impact would result in this regard.

Mitigation Measures: No mitigation is required.

c) Have a substantial adverse effect on State or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?

No Impact. No development or structures are proposed as part of the LBMC amendments. As such, no direct removal, filling, hydrological interruption, or other means of potentially affecting State or Federally protected wetlands would occur. The project would not increase development potential within the City, and none of the LBMC amendments would increase the potential for any development to occur within areas occupied by wetlands. No impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?

No Impact. The proposed amendments to LBMC Title 18, *Long Beach Building Standards Code*, represent standards for future applicable projects. No development or structures are proposed that would have a potential to affect native resident or migratory fish or wildlife species, interfere with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery site. Therefore, there would be no impact in this regard.

Mitigation Measures: No mitigation is required.

e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?

No Impact. As stated, no development or structures are proposed as part of the LBMC amendments. Nevertheless, future development projects subject to the proposed LBMC amendments would be subject to the City's local policies and ordinances protecting biological resources, including LBMC Chapter 14.28, *Trees and Shrubs*, which contains regulations on tree and shrub planting, removal, and maintenance, including the protection of all trees located along streets, alleys, courts, or other public places during construction activities. Thus, no impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?

No Impact. According to the U.S. Fish and Wildlife Service's *California Natural Community Conservation Plans Map,* the City is not located within a Natural Community Conservation Plan or a Habitat Conservation Plan.[1] As such, there would be no impact in this regard.

Mitigation Measures: No mitigation is required.

[1] California Department of Fish and Wildlife Service, *California Natural Community Conservation Plans*, April 2019. https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=68626&inline, accessed March 4, 2020.

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4.5 CULTURAL RESOURCES

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Cause a substantial adverse change in the significance of a historical resource pursuant to § 15064.5?				✓
b. Cause a substantial adverse change in the significance of an archaeological resource pursuant to § 15064.5?				✓
c. Disturb any human remains, including those interred outside of dedicated cemeteries?				✓

a) Cause a substantial adverse change in the significance of a historical resource pursuant to §15064.5?

No Impact. According to the General Plan Historic Preservation Element, the City has a number of historic properties listed in the National Register of Historic Places (NRHP), California Historical Landmarks (CHL), and a local list of historic landmarks and districts. NRHP-listed properties include the Los Cerritos Ranch House, RMS Queen Mary, First National Bank of Long Beach, and the Puvunga Indian Village Sites, among others. The City has two designated CHLs, including Rancho Los Cerritos (also listed in the NRHP) and the Long Beach Marine Stadium. As of 2020, there are 128 locally designated historic landmarks and 18 locally designated historic districts.[1,2]

The proposed amendments to LBMC Title 18, *Long Beach Building Standards Code*, provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. It is not anticipated that any of the proposed amendments to the LBMC include provisions that would have the capacity to substantially affect the features or attributes of existing historic structures as development within the City occurs in the future. The proposed amendments represent standards for future applicable projects, therefore, no development or structures are proposed that would otherwise have a potential to result in environmental impacts. Nevertheless, all future development subject to these LBMC amendments would be subject to historical resources review in accordance with City standards, pursuant to the City's Cultural Heritage Ordinance, as well as the Historic Preservation Element of the General Plan. Project implementation would not cause a substantial adverse change in the significance of a historical resource under CEQA. No impacts would result in this regard.

Mitigation Measures: No mitigation is required.

b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?

No Impact. The General Plan Historic Preservation Element states that the earliest known occupants of the present-day Long Beach area were part of the Gabrielino tribe, which occupied nearly the entire basin and coastline comprising the present-day counties of Los Angeles and Orange. Among the best-researched Gabrielino communities, Puvunga was a large settlement and important ceremonial site likely located in the area historically occupied by Rancho Los Alamitos and currently occupied by California State University, Long Beach. Puvunga likely served as a ritual center for Gabrielino communities in the region and is listed in the NRHP. Given the presence of Native American tribes in

1 City of Long Beach, *Historic Landmarks*, http://www.longbeach.gov/lbds/planning/preservation/historic-landmarks2/, accessed March 4, 2020.
2 City of Long Beach, *Historic Districts*, http://www.longbeach.gov/lbds/planning/preservation/districts/, accessed March 4, 2020.

the Long Beach area long before Spanish settlement occurred in 1542, there is potential for archaeological resources to be present within the City.

The proposed LBMC amendments represent standards for future applicable projects; no development or structures are proposed that would have a potential to result in environmental impacts. However, future development subject to the LBMC amendments analyzed herein would be subject to archaeological resources review according to City standards. The proposed amendments to the LBMC do not lessen existing legal protections of archaeological resources under Federal, State, or local requirements. Project implementation would not cause a substantial adverse change in the significance of an archaeological resource under CEQA. No impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

c) Disturb any human remains, including those interred outside of dedicated cemeteries?

No Impact. The Long Beach Municipal Cemetery, Sunnyside Cemetery, Forest Lawn Cemetery, and All-Souls Cemetery are located within Long Beach. Due to the built-out nature of the City, it is not anticipated that human remains, including those interred outside of dedicated cemeteries, would be encountered during development.

The proposed amendments represent standards for future applicable projects and no development or structures are proposed that would have a potential to result in environmental impacts. All future development subject to the LBMC amendments would still be subject to local and State provisions regarding human remains. As such, the proposed project would not disturb any human remains, including those interred outside of dedicated cemeteries, and no impacts would occur.

Mitigation Measures: No mitigation is required.

4.6 ENERGY

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?				✓
b. Conflict with or obstruct a State or local plan for renewable energy or energy efficiency?				✓

a) Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?

No Impact. The proposed project would not result in short-term construction or long-term operational energy consumption. The project proposes to add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. Overall, the proposed amendments would represent standards for future applicable projects, therefore, no development or structures are proposed that would have a potential to result in environmental impacts. The standards proposed to be added to the LBMC are not anticipated to result in any changes in development standards, design features, or land use controls that would result in any increases in energy consumption. Nevertheless, future projects subject to the LBMC amendments would similarly be subject to evaluation of energy consumption during construction and operational activities. Thus, the project would not result in wasteful, inefficient, or unnecessary consumption of energy resources and no impact would occur.

Mitigation Measures: No mitigation is required.

b) Conflict with or obstruct a State or local plan for renewable energy or energy efficiency?

No Impact. As noted above, the project would not directly result in short-term construction or long-term operational energy consumption. As such, the project would also comply with all applicable energy goals and measures identified in the City's *Sustainable City Action Plan*, including energy efficiency and renewable energy sources. No impact would occur in this regard.

Mitigation Measures: No mitigation is required.

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4.7 GEOLOGY AND SOILS

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:				
1) Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.				✓
2) Strong seismic ground shaking?				✓
3) Seismic-related ground failure, including liquefaction?				✓
4) Landslides?				✓
b. Result in substantial soil erosion or the loss of topsoil?				✓
c. Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on-or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?				✓
d. Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?				✓
e. Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?				✓
f. Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?				✓

a) Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:

1) Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.

No Impact: Southern California, including Long Beach, is subject to the effects of seismic activity due to the active faults that traverse the area. Active faults are defined as those that have experienced surface displacement within Holocene time (approximately the last 11,000 years) and/or are in a State-designated Alquist-Priolo Earthquake Fault Zone. According to the California Geological Survey, the Newport-Inglewood-Rose Canyon Fault Zone traverses the City and is designated as an Alquist-Priolo Earthquake Fault Zone. Specifically, the Reservoir Hill Fault, Northeast Flank Fault, and Cherry Hill Fault run through the City.[1]

[1] California Geological Survey, *Earthquake Zones of Required Investigation Long Beach Quadrangle*, March 25, 1999, http://gmw.conservation.ca.gov/SHP/EZRIM/Maps/LONG_BEACH_EZRIM.pdf, accessed March 4, 2020.

The proposed project would add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. Overall, the proposed LBMC amendments represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. As such, no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

2) Strong seismic ground shaking?

No Impact. Southern California has numerous active seismic faults subjecting residents to potential earthquake and seismic-related hazards. Seismic activity poses two types of potential hazards for residents and structures, categorized either as primary or secondary hazards. Primary hazards include ground rupture, ground shaking, ground displacement, subsidence, and uplift from earth movement. Primary hazards can also induce secondary hazards such as ground failure (lurch cracking, lateral spreading, and slope failure), liquefaction, water waves (seiches), movement on nearby faults (sympathetic fault movement), dam failure, and fires. Both primary and secondary hazards pose a threat to the community as a result of the project's proximity to active regional faults.

The region surrounding the Long Beach area is characterized by a relatively high seismic activity. The greatest damage from earthquakes results from ground shaking. Ground shaking is generally most severe near quake epicenters and generally become weaker further out from the epicenter. As discussed in Response 4.7(a)(1), the Reservoir Hill Fault, Northeast Flank Fault and Cherry Hill Fault traverse the City. The San Andreas fault, which is the largest active fault in California, is northeast of Long Beach. As such, the project site may be subject to strong seismic shaking during an earthquake event, as is the case with the vast majority of areas throughout southern California.

The proposed LBMC amendments related to construction in the vicinity of oil wells and methane gas mitigation represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. The standards proposed to be added to the LBMC would result in beneficial safety impacts, and would not result in any changes in development or building standards that would increase hazards related to seismic ground shaking. Further, future development projects subject to the proposed LBMC amendments would also be subject to other applicable local, State, and Federal standards related to seismic hazards. Thus, no impacts would result in this regard.

Mitigation Measures: No mitigation is required.

3) Seismic-related ground failure, including liquefaction?

No Impact. Liquefaction of cohesionless soils can be caused by strong vibratory motion due to earthquakes. Liquefaction is characterized by a loss of shear strength in the affected soil layers, thereby causing the soils to behave as a viscous liquid. Susceptibility to liquefaction is based on geologic and geotechnical data. River channels and floodplains are considered most susceptible to liquefaction, while alluvial fans have a lower susceptibility. Depth to groundwater is another important element in the susceptibility to liquefaction. Groundwater shallower than 30 feet results in high to very high susceptibility to liquefaction, while deeper water results in low and very low susceptibility.

Based on the California Geological Survey's *Earthquake Zones of Required Investigation Long Beach Quadrangle*, areas within the City are mapped as susceptible to liquefaction.[2] However, the proposed LBMC amendments do not propose any development or structures and thus, would not affect soil conditions or groundwater. The standards proposed to be added to the LBMC would result in beneficial safety impacts, and would not result in any changes in development or building standards that would increase hazards related to ground failure or liquefaction. All future

[2] Ibid.

projects subject to the proposed amendments would also be subject to liquefaction hazard standards in accordance with City requirements. Therefore, no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

4) Landslides?

No Impact. Landslides are geologic hazards, with some moving slowly and causing damage gradually, and others moving rapidly and causing unexpected damage. Gravity is the force driving landslide movement. Factors that commonly allow the force of gravity to overcome the resistance of earth material to landslide movement include saturation by water, steepening of slopes by erosion or construction, alternate freezing or thawing, and seismic shaking.

Based on the California Geological Survey's *Earthquake Zones of Required Investigation Long Beach Quadrangle*, limited portions of the City along the Long Beach Fault Zone are susceptible to seismically-induced landslides.[3] However, the proposed LBMC amendments would not include activities that would directly disturb landslide-prone areas. Therefore, no impacts would result in this regard.

Mitigation Measures: No mitigation is required.

b) Result in substantial soil erosion or the loss of topsoil?

No Impact. Soil erosion or loss of topsoil is primarily associated with the grading and earthwork activities during the construction phase of a project. As stated, the project does not propose any development or structures. Future projects subject to the proposed LBMC amendments would be subject to existing requirements to minimize the effects of erosion, runoff, and loss of topsoil, as required under City standards and the National Pollutant Discharge Elimination System (NPDES) regulations administered by the State Water Resources Quality Control Board. Therefore, there would be no impact in this regard.

Mitigation Measures: No mitigation is required.

c) Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in an on-site or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?

No Impact. The City is located within a seismically-active area. As stated in Responses 4.7(a)(3) and 4.7(a)(4), no impacts related to liquefaction and landslide hazards would occur as a result of project implementation. Similarly, given that no development or structures are proposed as part of the LBMC amendments, no impacts related to hazardous geologic units or soils would occur. The standards proposed to be added to the LBMC would result in beneficial safety impacts, and would not result in any changes in development or building standards that would increase hazards related to unstable soils. No impact would result in this regard.

Mitigation Measures: No mitigation is required.

d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?

No Impact. Refer to Response 4.7(c), above. No impacts would occur in relation to expansive soils.

Mitigation Measures: No mitigation is required.

[3] Ibid.

e) Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?

No Impact. The entire City is served by an existing sewer system, and therefore, no septic tanks or any other alternative wastewater disposal systems would be constructed as part of any future development. No impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?

No Impact. As no development is proposed as part of the project, project implementation would not directly or indirectly destroy paleontological resources or unique geologic features. Any future development project having the potential to impact paleontological resources as part of ground-disturbing activities would be subject to site-specific, separate environmental review under CEQA. Therefore, no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

4.8 GREENHOUSE GASES

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?				✓
b. Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?				✓

a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?

No Impact. Greenhouse gases (GHGs) trap heat in the atmosphere and are emitted from both natural processes and human activities. The State of California and United States Environmental Protection Agency (USEPA) have identified six GHGs generated by human activity that are believed to be the primary contributors to man-made global warming: carbon dioxide (CO_2), methane (CH_4), nitrous oxide (N_2O), hydrofluorocarbons (HFC), perfluorocarbons (PFC), and sulfur hexafluoride (SF_6). Examples of GHGs produced both by natural processes and human activity include CO_2, CH_4, and N_2O. Examples of GHGs emitted through human activities alone include fluorinated gases and SF_6.

The proposed project would add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. No development or structures are proposed that would have a potential to generate short- or long-term GHG emissions. Additionally, Chapter 18.79, *Methane Gas Mitigation*, would require CH_4 mitigation, including soil gas testing, leak testing, and site design review, among others, to ensure CH_4 emissions do not leak from abandoned oil/gas wells prior to new construction occurring in the vicinity. This would help reduce previously unknown CH_4 gas leaks in the City and reduced CH_4 emissions in the SCAB region. As such, adoption of the proposed amendments, in particular Chapter 18.79, *Methane Gas Mitigation*, would result in a beneficial impact regarding GHG emissions. Further, all future projects subject to the LBMC amendments would also be required to ensure generated GHG emissions do not result in a significant impact on the environment. No impact would occur in this regard.

Mitigation Measures: No mitigation is required.

b) Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?

No Impact. The California Air Resources Board (CARB) approved the *2017 Climate Change Scoping Plan Update* (Scoping Plan) on December 14, 2017. The Scoping Plan provides the strategy for achieving California's 2030 GHG emissions reduction target that was approved by Senate Bill 32. The Scoping Plan states that achieving no net increase in GHG emissions is the correct overall objective for project-level CEQA analysis, but also recognizes that such a standard may not be appropriate or feasible for every development project.

As stated above, the proposed LBMC amendments related to construction in the vicinity of oil wells and methane gas mitigation represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. As discussed, no development or structures are proposed, and thus, the project would not generate short- or long-term GHG emissions. Nevertheless, future projects subject to the

proposed LBMC amendments analyzed herein would be subject to compliance with applicable plan, policy, or regulations of an agency adopted for the purpose of reducing the emissions of GHGs, including Assembly Bill 32, Senate Bill 32, and the Scoping Plan. No impact would occur in this regard.

Mitigation Measures: No mitigation is required.

4.9 HAZARDS AND HAZARDOUS MATERIALS

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?				✓
b. Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?				✓
c. Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?				✓
d. Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?				✓
e. For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?				✓
f. Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?				✓
g. Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?				✓

a) Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?

No Impact. The proposed project would add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. Overall, the proposed LBMC amendments represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. The proposed amendments would not alter future land uses in the City, and would not have the potential to increase development of uses that routinely transport, use or dispose hazardous materials. Any future land uses or activities subject to the provisions of this project that involve the handling and disposal of hazardous or potentially hazardous materials would be required to fully comply with LBMC Sections 8.86 through 8.88, as well as all existing State safety regulations. The project is expected to result in benefits related to safety associated with future development in the vicinity of oil wells. As such, no impacts would occur.

Mitigation Measures: No mitigation is required.

b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?

No Impact. Refer to Response 4.9(a). The proposed Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, introduce development standards, mitigation, and procedures for new construction in the vicinity of active or abandoned oil wells, landfills, or properties formally containing storage tanks or surface impoundments containing petroleum products. Given that much of the City is built around oil/gas wells, landfills, and other methane-producing sources and the City does not have any adopted methane gas mitigation standards, the proposed LBMC amendments would ensure future applicable development projects mitigate potential hazards associated with oil/gas wells and other methane-producing sources. The project would improve the City's response to potential significant hazards through reasonably foreseeable upset and accident conditions that can release hazardous materials (e.g., methane) into the environment. More generally, the proposed amendments would not alter future land uses in the City, and no development or structures are proposed that could create a significant hazard through reasonably foreseeable upset or accident conditions regarding hazardous materials. The project is expected to result in benefits related to safety associated with future development in the vicinity of oil wells. Therefore, no impacts in this regard would occur.

Mitigation Measures: No mitigation is required.

c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?

No Impact. Refer to Responses 4.9(a) and 4.9(b). The proposed amendments would not alter future land uses in the City, no development or structures are proposed that could increase any risks of upset or accident conditions regarding hazardous materials. The project is expected to result in benefits related to safety associated with future development in the vicinity of oil wells. As such, there would be no impact in this regard.

Mitigation Measures: No mitigation is required.

d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?

No Impact. Government Code Section 65962.5 requires the California Department of Toxic Substances Control (DTSC) and the State Water Resources Control Board to compile and update a regulatory sites listing (per the criteria of the Section). Government Section 65962.5 requires the local enforcement agency, as designated pursuant to Section 18051 of Title 14 of the California Code of Regulations, to compile, as appropriate, a list of all solid waste disposal facilities from which there is a known migration of hazardous waste. As the proposed project applies to the entire City, it involves a large geographic area with varying uses, and there are numerous sites listed pursuant to Government Code Section 65962.5.[1] However, as discussed in Responses 4.9(a) and 4.9(b), the proposed LBMC amendments represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in increased hazard to the public or environment. Additionally, given that much of the City is built around oil/gas wells, landfills, and other methane-producing sources and the City does not have any adopted methane gas mitigation standards, the proposed LBMC amendments would ensure future applicable development projects mitigate potential hazards associated with oil/gas wells and other methane-producing sources. Any future land uses or activities subject to the provisions of this project that involve the handling and disposal of hazardous or potentially hazardous materials would also be required to comply with LBMC Sections 8.86 through 8.88, as well as all existing State safety regulations. Additionally, the project is expected to result in benefits related to safety associated with future development in the vicinity of oil wells. Therefore, no impacts would occur in this regard.

[1] California Environmental Protection Agency, *Cortese Listing*, https://calepa.ca.gov/sitecleanup/corteselist/, accessed March 4, 2020.

Mitigation Measures: No mitigation is required.

e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?

No Impact. The Long Beach Airport Influence Area encompasses portions of the City.[2] However, as discussed in Response 4.9(a), the proposed LBMC amendments represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. The proposed amendments would not alter air traffic patterns or encourage future developments that could conflict with established Federal Aviation Administration (FAA) flight requirements. Therefore, the project would not result in safety hazards or excessive noise for people residing or working in the City.

Mitigation Measures: No mitigation is required.

f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?

No Impact. The proposed project would not physically interfere with an adopted emergency response plan or emergency evacuation plan because no construction activities are proposed as part of the LBMC amendments. None of the proposed LBMC amendments would have the potential to conflict with any emergency response/evacuation plan. As such, no impacts would result in this regard.

Mitigation Measures: No mitigation is required.

g) Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?

No Impact. As discussed in Section 4.20, *Wildfire*, the City is not located in an area identified as a Very High Fire Hazard Zone. Additionally, no structures are directly proposed as part of the project. Thus, there would be no impact in this regard.

Mitigation Measures: No mitigation is required.

[2] Los Angeles County Airport Land Use Commission, *Long Beach Airport, Airport Influence Area Map*, May 13, 2003, http://planning.lacounty.gov/assets/upl/project/aluc_airport-long-beach.pdf, accessed March 4, 2020.

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4.10 HYDROLOGY AND WATER QUALITY

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality?				✓
b. Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?				✓
c. Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:				✓
1) Result in substantial erosion or siltation on- or off-site?				✓
2) Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or offsite?				✓
3) Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?				✓
4) Impede or redirect flood flows?				✓
d) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?				✓
e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?				✓

a) Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality?

No Impact. As part of Section 402 of the Clean Water Act, the United States Environmental Protection Agency has established regulations under the National Pollutant Discharge Elimination System (NPDES) program to control direct stormwater discharges. In California, the State Water Resources Control Board (SWRCB) administers the NPDES permitting program and is responsible for developing NPDES permitting requirements. The NPDES program regulates industrial pollutant discharges, which include construction activities. The SWRCB works in coordination with the Regional Water Quality Control Boards (RWQCB) to preserve, protect, enhance, and restore water quality. The City of Long Beach is within the jurisdiction of the Los Angeles RWQCB.

The proposed amendments to LBMC Title 18, *Long Beach Building Standards Code*, regarding construction in the vicinity of oil wells and methane gas mitigation represent standards for future applicable projects. No development or structures are proposed that would have a potential to result in environmental impacts. Further, all future development subject to the LBMC amendments would similarly be subject to water quality standards in accordance with City and Los Angeles RWQCB standards. These standards proposed to be added to the LBMC are not anticipated to result in

any changes in development standards or design features that would result in adverse impacts related to water quality. Project implementation would not violate any water quality standards or waste discharge requirements.

Mitigation Measures: No mitigation is required.

b) Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?

No Impact. The City overlies the Coastal Plain of Los Angeles West Coast and Central groundwater basins. The West Coast basin encompasses 142 square miles and extends southwesterly along the coast from the Newport-Inglewood uplift to the Santa Monica Bay.[1] The Central basin encompasses 277 square miles and extends northeasterly from the West Coast basin's eastern boundary to the Elysian, Merced, and Puente Hills.[2]

The proposed amendments to LBMC Title 18, *Long Beach Building Standards Code*, represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. The LBMC amendments would not result in an increase in development intensity or land use that would allow for an increase in impervious area or allow for any additional uses that otherwise affect groundwater. As such, project implementation would not substantially decrease groundwater supplies or interfere substantially with groundwater recharge.

Mitigation Measures: No mitigation is required.

c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of stream or river or through the addition of impervious surfaces, in a manner which would:

1) Result in substantial erosion or siltation on- or off-site?

No Impact. The NPDES program administered by the Los Angeles RWQCB regulates stormwater discharges associated with development projects. Compliance with the NPDES requirements involves the preparation of a Stormwater Pollution Prevention Plan (SWPPP), which would require implementation of best management practices (BMPs) that reduce the volume of sediment-laden runoff discharging from a site during construction activities. Other structural and non-structural BMPs associated with the SWPPP would also reduce the potential for sediment and stormwater runoff containing pollutants from entering receiving waters.

As stated above, the proposed LBMC amendments related to construction in the vicinity of oil wells and methane gas mitigation represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. Nevertheless, future projects subject to the proposed LBMC amendments would be subject to NPDES requirements. Additionally, the standards proposed to be added to the LBMC are not anticipated to result in any changes in development standards or design features that would result in an increased potential for erosion or siltation. As such, project implementation would not substantially alter existing drainage patterns in a manner which would result in substantial erosion or siltation.

Mitigation Measures: No mitigation is required.

[1] California Department of Water Resources, *California's Groundwater Bulletin 118, Coastal Plain of Los Angeles Groundwater Basin, Central Subbasin*, February 27, 2004.
[2] California Department of Water Resources, *California's Groundwater Bulletin 118, Coastal Plain of Los Angeles County Groundwater Basin, West Coast Subbasin*, February 27, 2004.

2) Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or offsite?

No Impact. Refer to Response 4.10(c)(1). None of the proposed LBMC amendments would result in an increase in development intensity or land use that would allow for an increase in impervious area or otherwise increase the rate or amount of surface runoff. No development or structures are proposed that would have a potential to result in environmental impacts. As such, no impacts are anticipated.

Mitigation Measures: No mitigation is required.

3) Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff?

No Impact. Refer to Responses 4.10(c)(1) and 4.10(c)(2). No development or structures are proposed as part of the LBMC amendments, and none of the proposed amendments would allow for development that would increase stormwater runoff. No impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

4) Impede or redirect flood flows?

No Impact. According to the *City of Long Beach Federal Emergency Management Agency (FEMA) Flood Zones Maps*, special flood hazard areas within the City include areas along the Los Angeles River, San Gabriel River, Coyote Creek, and Los Cerritos Channel, and areas surrounding the Port of Long Beach (POLB), Belmont Shores, Marina Pacifica, Naples, and the Peninsula.[3]

As stated above, the proposed LBMC amendments related to construction in the vicinity of oil wells and methane gas mitigation represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. Nevertheless, all future development subject to the LBMC amendments would be subject to flood zone development standards in accordance with City and National Flood Insurance Program regulations. As such, project implementation would not substantially alter existing drainage patterns in a manner which would impede or redirect flood flows.

Mitigation Measures: No mitigation is required.

d) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?

No Impact. Refer to Response 4.10(c)(4) regarding flood hazards.

A tsunami is a great sea wave, commonly referred to as a tidal wave, produced by a significant undersea disturbance such as tectonic displacement of a sea floor associated with large, shallow earthquakes. A seiche is an oscillation of a body of water in an enclosed or semi-enclosed basin, such as a reservoir, harbor, lake, or storage tank. Based on the California Geological Survey's tsunami inundation maps for the Long Beach and Los Alamitos/Seal Beach quadrangles, tsunami inundation areas within the City include the POLB, Belmont Shores, Naples, Marina Pacifica and the Peninsula, as well as the southern segments of the Los Angeles River, San Gabriel River, and Los Cerritos Channel closer to the Pacific Ocean.[4,5]

[3] City of Long Beach, *City of Long Beach Federal Emergency Management Agency (FEMA) Flood Zones*, effective September 26, 2008.
[4] California Geological Survey, *Tsunami Inundation Map for Emergency Planning, Long Beach Quadrangle*, March 1, 2009.
[5] California Geological Survey, *Tsunami Inundation Map for Emergency Planning, Los Alamitos/Seal Beach Quadrangle*, March 15, 2009.

The proposed amendments to LBMC Title 18, *Long Beach Building Standards Code*, represent standards for future applicable projects, therefore, no development or structures are proposed that would have a potential to result in environmental impacts. As such, project implementation would not exacerbate existing potential for tsunami or seiche inundation beyond existing conditions nor would it risk release of pollutants should inundation occur.

Mitigation Measures: No mitigation is required.

e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?

No Impact. The *Basin Plan for the Coastal Watersheds of Los Angeles and Venture Counties* (Basin Plan) establishes water quality standards for ground and surface waters within the Los Angeles region, which includes the City, and is the basis for the Los Angeles RWQCB's regulatory programs.

The 2014 Sustainable Groundwater Management Act requires local public agencies and groundwater sustainability agencies in high- and medium-priority basins to develop and implement groundwater sustainability plans (GSPs) or prepare an alternative to a groundwater sustainability plan. As stated above, the City underlies the Coastal Plain of Los Angeles West Coast and Central groundwater basins, which are designated as Very Low priority basins.[6] Therefore, there are no groundwater sustainability plans established for the basins. However, the Water Replenishment District of Southern California developed the *Groundwater Basins Master Plan* (GBMP), which identifies projects and programs to enhance basin replenishment, increase reliability of groundwater resources, and improve and protect groundwater quality in the West Coast and Central groundwater basins.[7]

The proposed LBMC amendments represent standards for future applicable projects, therefore, no development or structures are proposed that would have a potential to result in environmental impacts. Future development subject to the LBMC amendments analyzed herein would also be required to comply with applicable water quality control plans or sustainable groundwater management plans. As such, no impacts would occur in this regard.

Mitigation Measures: No mitigation required.

6 California Department of Water Resources, *SGMA Basin Prioritization Dashboard*, https://gis.water.ca.gov/app/bp-dashboard/p2/, accessed March 4, 2020.
7 Water Replenishment District of Southern California, *Groundwater Basins Master Plan*, September 2016.

4.11 LAND USE AND PLANNING

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Physically divide an established community?				✓
b. Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?			✓	

a) Physically divide an established community?

No Impact. According to the General Plan Land Use Element, the City has 70 distinct neighborhoods encompassed within the following nine community areas, which represent established communities in Long Beach:

- North Long Beach;
- Bixby Knolls;
- Westside and Wrigley;
- Central;
- Downtown;
- Midshore;
- Traffic Circle;
- Eastside; and
- Southeast.

The proposed amendments to LBMC Title 18, *Long Beach Building Standards Code*, regarding construction in the vicinity of oil wells and methane gas mitigation represent standards for future applicable projects. No development or structures are proposed that would have a potential to result in environmental impacts. The proposed amendments would not result in any changes in designated land use or increases in development intensity. Nevertheless, all future development subject to the LBMC amendments would also be subject to land use compatibility review in accordance with City standards. As such, project implementation would not physically divide an established community and no impacts would result in this regard.

Mitigation Measures: No mitigation is required.

b) Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?

Less Than Significant Impact. Development within the City is subject to a number of land use plans, policies, and regulations, typically dependent on the project location. Applicable land use plans and regulations include the General Plan, LBMC Title 21, *Zoning*, and several specific plan and planned development districts. Projects within the City of Long Beach Harbor District (Port of Long Beach; POLB) and Coastal Zone are also subject to consistency with the *Port of Long Beach Port Master Plan* (PMP) and California Coastal Act (CCA).

Discretionary land use approvals associated with the project include the adoption of an ordinance associated with the LBMC Title 18 amendments (Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*). The proposed amendments represent standards for future applicable projects throughout the City; no development or structures are proposed that would have a potential to result in environmental impacts. Nevertheless,

future development subject to the proposed amendments would still be subject to land use and zoning review in accordance with applicable land use plans, policies, or regulations, including LBMC Title 21, *Zoning*, the City's various specific plan and planned development districts, the POLB's PMP, and the CCA.

Table 4.11-1, *General Plan Land Use Element Consistency Analysis*, analyzes project consistency with applicable General Plan land use goals and policies.

Table 4.11-1
General Plan Land Use Element Consistency Analysis

Relevant Goals and Policies	Consistency Analysis
Goal No. 2: Strengthen the City's Fiscal Health by Stimulating Continuous Economic Development and Job Growth	
LU Policy 4-2: Promote the transition of some heavy industrial and manufacturing sites to creative green and sustainable industries.	Consistent. The City has received numerous requests from potential developers and property owners regarding development of habitable and non-habitable structures in the vicinity of existing oil/gas wells. The current California Geologic Energy Management Division well abandonment standards prohibit development on sites with previously abandoned wells in the City. Additionally, the City does not have any adopted methane gas mitigation standards in the LBMC. The proposed LBMC Title 18 amendments would introduce Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells, including potential creative green and sustainable industry developments. As such, inclusion of the proposed chapters into the LBMC would promote the transition of heavy industrial sites to other industry developments that would stimulate the City's economic development.
LU Policy 6-11: Pursue new developments and businesses that add to the City's economic base, particularly those that generate sales tax and property tax increment revenue.	Consistent. Refer to response to LU Policy 4-2. The proposed LBMC amendments would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells, which would add to the City's economic base.
Goal No. 3: Accommodate Strategic Growth and Change	
LU Policy 7-2: Convert outdated and underutilized manufacturing and industrial sites to Neo-Industrial uses, particularly those adjacent to residential areas.	Consistent. Refer to response to LU Policy 4-2. Future development in the vicinity of oil wells that comply with the proposed LBMC amendments can include neo-industrial uses, such as light industrial, manufacturing, and office uses.
LU Policy 7-3: Allow heavy industry uses, as well as oil and gas facilities, to transition to green industry where feasible and desired.	Consistent. Refer to response to LU Policy 4-2. The proposed LBMC amendments would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells, which can include green industry development.
Source: City of Long Beach, *City of Long Beach General Plan Land Use Element*, December 3, 2019.	

Overall, the proposed amendments would not cause any significant environmental impacts due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect. Impacts in this regard would be less than significant.

Mitigation Measures: No mitigation is required.

4.12 MINERAL RESOURCES

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?				✓
b. Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?				✓

a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?

No Impact. According to the California Department of Conservation's *Generalized Mineral Land Classification Map of Los Angeles County – South Half*, the City and surrounding piers are designated Mineral Resource Zone (MRZ) 1, 3, and 4. MRZ-1 is defined as areas where adequate information indicates that no significant mineral deposits are present, or where it is judged that little likelihood exists for their presence. MRZ-3 is defined as areas containing mineral deposits that cannot be evaluated from available data. MRZ-4 is defined as areas where available information is inadequate for assignment to other mineral resource zones.[1] The proposed project would add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. Overall, the proposed LBMC amendments represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. Additionally, the proposed amendments would not change future land uses in the City, or result in any increase in future uses that could potentially affect availability of mineral resources. All future projects would continue to be required to comply with applicable City, State, or Federal requirements regarding mineral resources. Thus, development of the proposed project would not result in a loss of availability of the identified mineral resources, and no impact would occur.

Mitigation Measures: No mitigation is required.

b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?

No Impact. Refer to Response 4.12(a).

Mitigation Measures: No mitigation is required.

[1] California Department of Conservation Division of Mines and Geology, *Generalized Mineral Land Classification Map of Los Angeles County – South Half*, 1994, ftp://ftp.consrv.ca.gov/pub/dmg/pubs/ofr/OFR_94-14/OFR_94-14_Plate1B.pdf, accessed March 16, 2020.

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4.13 NOISE

Would the project result in:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?				✓
b. Generation of excessive groundborne vibration or groundborne noise levels?				✓
c. For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?				✓

a) Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?

No Impact. The project proposes to add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. Overall, the proposed amendments would represent standards for future applicable projects. No development or structures are proposed that would have a potential to result in environmental impacts, including short- and long-term noise. These standards proposed to be added to the LBMC are not anticipated to result in any changes in development standards or design features that would result in adverse impacts related to noise.

Future construction activities occurring under the proposed LBMC amendments could involve various types of short-term noise impacts from trucks, earth-moving equipment, and paving equipment. However, all construction activities and land use operations must be conducted in compliance with the City's Noise Ordinance (Long Beach Municipal Code Section 8.80). Project implementation would not alter the Noise Ordinance provisions or exempt any future land uses or improvements from local noise controls. The Noise Ordinance would continue to regulate all future land use construction and operational noise levels. As such, the proposed LBMC amendments would not create a substantial temporary or permanent increase in ambient noise levels and no impact would occur.

Mitigation Measures: No mitigation is required.

b) Generation of excessive groundborne vibration or groundborne noise levels?

No Impact. Refer to Response 4.13(a), above. The proposed amendments would represent standards for future applicable projects within the City, and no development or structures are proposed that would have a potential to result in vibration or groundborne noise impacts. Future development occurring within the City would continue to be subject to the City's local noise and vibration controls. No impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

c) For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?

No Impact. A portion of the City is located within the Long Beach Airport Influence Area.[1] The proposed amendments to LBMC Title 18, *Long Beach Building Standards Code* represent standards for future applicable projects. No development or structures are proposed that would have a potential to expose people residing or working in the project area to excessive airport noise levels. Therefore, no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

[1] Los Angeles County Airport Land Use Commission, *Long Beach Airport, Airport Influence Area Map*, May 13, 2003, http://planning.lacounty.gov/assets/upl/project/aluc_airport-long-beach.pdf, accessed March 4, 2020.

4.14 POPULATION AND HOUSING

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?				✓
b. Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?				✓

a) Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?

No Impact. The project proposes to add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. None of the proposed amendments would involve an increase in development intensity or change in land use that would facilitate an increase in population growth. As such, no impact would occur in this regard.

Mitigation Measures: No mitigation is required.

b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?

No Impact. Refer to Response 4.14(a). No impact would occur in this regard.

Mitigation Measures: No mitigation is required.

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4.15 PUBLIC SERVICES

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
1) Fire protection?				✓
2) Police protection?				✓
3) Schools?				✓
4) Parks?				✓
5) Other public facilities?				✓

a) Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:

1) Fire protection?

No Impact. The Long Beach Fire Department (LBFD) provides fire protection within Long Beach and has 23 stations throughout the City. The project involves amendments to the LBMC to allow for future development in the vicinity of oil wells. The proposed amendments are not intended to directly or indirectly induce population growth that could result in increased demand for fire protection services or fire protection facilities. All new development subject to the proposed amendments would continue to be subject to fire code review during the building plan check process as well as to fire facilities impact fees. Additionally, the project is expected to result in benefits related to public safety associated with future development in the vicinity of oil wells. As such, the project would not require the construction of new or physically altered fire protection facilities and no impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

2) Police protection?

No Impact. The Long Beach Police Department (LBPD) provides law enforcement services to the City. According to the *Police Reporting Districts with Divisions & Beats Map*, the LBPD operates out of a central location at 400 West Broadway, with 25 police divisions throughout the City.[1] As discussed in Response 4.15(a)(1), the project involves amendments to the LBMC that are not intended to directly or indirectly induce population growth that could result in increased demand for police protection services or police protection facilities. As a result, project implementation is

[1] City of Long Beach Police Department, *Police Reporting Districts with Divisions & Beats Map*, http://www.longbeach.gov/globalassets/ti/media-library/documents/gis/map-catalog/36x36-citymap_with_policedivisions_beats_rd, accessed March 17, 2020.

not anticipated to increase LBPD response times or require the construction of new or physically altered police protection facilities. No impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

3) Schools?

No Impact. The proposed project would not introduce any new residents into the City that may utilize school services provided within the City. As such, implementation of the proposed project would not result in increased demand for school services or the need for the construction of additional school facilities. No impact would occur in this regard.

Mitigation Measures: No mitigation is required.

4) Parks?

No Impact. According to the City of Long Beach Parks, Recreation, and Marine Department, the City maintains 170 parks with 26 community centers, among other programs and services.[2] Project implementation would not introduce any new residents into the City and thus, would not generate a demand for park facilities or increase the use of existing facilities. Therefore, there would be no impact in this regard.

Mitigation Measures: No mitigation is required.

5) Other public facilities?

No Impact. No other impacts have been identified that would require the provision of new or physically-altered public facilities (e.g., libraries). New development projects subject to the proposed amendments would continue to be subject to public facility impact fees, as applicable, and reviewed by the City. No impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

[2] City of Long Beach, *Long Beach Parks, Recreation and Marine Department Website*, http://www.longbeach.gov/park/, accessed March 17, 2020.

4.16 RECREATION

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?				✓
b. Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?				✓

a) Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?

No Impact. Refer to Response 4.15(a)(4). The proposed amendments to Title 18 of the LBMC would not introduce any new residents into the City and thus, would not result in an increase in demand on parks or other recreational facilities. No impact would occur in this regard.

Mitigation Measures: No mitigation is required.

b) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?

No Impact. The project does not include recreational facilities nor would it require the construction or expansion of existing recreational facilities. Therefore, there would be no impact in this regard.

Mitigation Measures: No mitigation is required.

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4.17 TRANSPORTATION

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Conflict with a program plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities?				✓
b. Conflict with or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b)?				✓
c. Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?				✓
d. Result in inadequate emergency access?				✓

a) Conflict with a program plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities?

No Impact. The City consists of a dense network of transit, roadways, bicycle, and pedestrian facilities. Long Beach Transit (LBT) provides transit and demand-response services in the City and surrounding communities, covering a 98-square mile service area with 37 local service routes. Additionally, the Los Angeles County Metropolitan Transportation Authority (Metro) operates a limited number of local and express buses and the Metro Blue Line passenger rail.

According to the General Plan Mobility Element, the City has over 60 miles of off-street bike and pedestrian paths, including the Shoreline pedestrian/bicycle path, Los Angeles River Bike Trail, San Gabriel River Bike Trail, El Dorado Park Bike Path, and Heartwell Park Bike Path.

The project proposes to add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18, *Long Beach Building Standards Code,* of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. Overall, the proposed amendments would represent standards for future applicable projects, therefore, no development or structures are proposed that would have a potential to result in environmental impacts. These standards proposed to be added to the LBMC are not anticipated to result in any changes in development standards or land uses that would result in any impacts to the circulation system. Nevertheless, all future development subject to the proposed amendments would be subject to transportation plan, ordinance, and policy review in accordance with City standards. As such, no impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

b) Conflict with or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b)?

No Impact. The proposed amendments to Title 18 of the LBMC represent standards applicable to future development in the vicinity of oil wells. No development or structures are proposed that would encourage or plan for significant traffic growth or result in significant impacts related to vehicle miles traveled (VMT). The proposed amendments associated with the project would not alter future land uses in the City, and would not have the potential to increase development intensity that would result in any additional generation of VMT. Future developments subject to the LBMC amendments

analyzed herein would continue to be subject to traffic and transportation analysis according to City standards. Overall, no impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

c) Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?

No Impact. The proposed amendments to Title 18 of the LBMC represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. Nevertheless, future developments subject to the LBMC amendments analyzed herein would still be subject to circulation design review in accordance with City standards. Thus, the project would not increase hazards due to a geometric design feature or introduce incompatible uses within the City. No impact would occur in this regard.

Mitigation Measures: No mitigation is required.

d) Result in inadequate emergency access?

No Impact. Refer to Responses 4.17(a) through 4.17(c), above. No development or structures are proposed as part of the amendments to Title 18 of the LBMC. Therefore, project implementation would not result in inadequate emergency access in the City. No impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

4.18 TRIBAL CULTURAL RESOURCES

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:				
1) Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code section 5020.1(k), or				✓
2) A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resource Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.				✓

As of July 1, 2015, California Assembly Bill 52 (AB 52) was enacted and expanded CEQA by establishing a formal consultation process for California tribes within the CEQA process. The bill specifies that any project may affect or cause a substantial adverse change in the significance of a tribal cultural resource would require a lead agency to "begin consultation with a California Native American tribe that is traditional and culturally affiliated with the geographic area of the proposed project." Section 21074 of AB 52 also defines a new category of resources under CEQA called "tribal cultural resources." Tribal cultural resources are defined as "sites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe" and is either listed on or eligible for the California Register of Historical Resources or a local historic register, or if the lead agency chooses to treat the resource as a tribal cultural resource.

On February 19, 2016, the California Natural Resources Agency proposed to adopt and amend regulations as part of AB 52 implementing Title 14, Division 6, Chapter 3 of the California Code of Regulations, CEQA Guidelines, to include consideration of impacts to tribal cultural resources pursuant to Government Code Section 11346.6. On September 27, 2016, the California Office of Administrative Law approved the amendments to Appendix G of the CEQA Guidelines, and these amendments are addressed within this environmental document.

In compliance with AB 52, the City of Long Beach distributed letters on February 26, 2020 to Native American tribes notifying each tribe of the opportunity to consult with the City regarding the proposed project; refer to Appendix B, *AB 52 Documentation*. The tribes were identified based on a list provided by the Native American Heritage Commission (NAHC) or were tribes that had previously requested to be notified of future projects proposed by the City.

a) Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:

1) Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code section 5020.1(k), or

No Impact. Refer to Response 4.5(a). There are a number of historic resources, landmarks, and properties within the City listed in the National Register of Historic Places, California Historical Landmarks, and the City's local list of designated historic properties and historic districts. The proposed LBMC amendments provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. It is not anticipated that any of the proposed amendments to the LBMC include provisions that would have the capacity to substantially affect the features or attributes of existing historic tribal cultural resources within the City. The proposed amendments represent standards for future applicable projects; therefore, no development or structures are proposed that would otherwise have a potential to result in environmental impacts. As such, no impacts would result in this regard.

Mitigation Measures: No mitigation is required.

2) A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resource Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.

No Impact. Refer to Response 4.18(a). As stated, in accordance with AB 52, the City distributed letters on February 26, 2020 to Native American tribes notifying each tribe of the opportunity to consult with the City regarding the proposed project. The 30-day period for tribes to request consultation ended on March 26, 2020. Mr. Andrew Salas of the Gabrieleno Band of Mission Indians – Kizh Nation requested consultation on March 24, 2020, however later stated that no consultation would be required given that the proposed project would not result in any ground disturbing activities. Thus, the City complied with AB 52 requirements and the consultation process has concluded. No tribal cultural resources were identified through the AB 52 process, as such, no impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

4.19 UTILITIES AND SERVICE SYSTEMS

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Require or result in the relocation or construction of new or expanded water, or wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?				✓
b. Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?				✓
c. Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?				✓
d. Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?				✓
e. Comply with Federal, State, and local management and reduction statutes and regulations related to solid waste?				✓

a) Require or result in the relocation or construction of new or expanded water, or wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?

No Impact. The project proposes to add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. Overall, the proposed LBMC amendments represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts.

Further, the proposed amendments to the LBMC would not result in any change in land uses within the City, or increase in development potential. The City is urbanized and built out with utilities and infrastructure for water, wastewater, storm water drainage, and dry utilities services fully in place. Future demands for utilities and service systems have been anticipated in the General Plan goals, policies, and programs for future growth. No impacts would occur in this regard.

Mitigation Measures: No mitigation is required.

b) Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?

No Impact. Refer to Response 4.19(a).

Mitigation Measures: No mitigation is required.

c) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?

No Impact. Refer to Response 4.19(a).

Mitigation Measures: No mitigation is required.

d) Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?

No Impact. Refer to Response 4.19(a).

Mitigation Measures: No mitigation is required.

e) Comply with Federal, State, and local management and reduction statutes and regulations related to solid waste?

No Impact. Refer to Response 4.19(a).

Mitigation Measures: No mitigation is required.

4.20 WILDFIRE

If located in or near State responsibility areas or lands classified as very high fire hazard severity zones, would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Substantially impair an adopted emergency response plan or emergency evacuation plan?				✓
b. Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?				✓
c. Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?				✓
d. Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?				✓

a) Substantially impair an adopted emergency response plan or emergency evacuation plan?

No Impact. According to the California Department of Forestry and Fire, the City of Long Beach is not located within or near a State Responsibility Area or identified as a Very High Fire Hazard Severity Zone.[1] Therefore, no impact would result.

Mitigation Measures: No mitigation is required.

b) Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?

No Impact. Refer to Response 4.20(a).

Mitigation Measures: No mitigation is required.

c) Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?

No Impact. Refer to Response 4.20(a).

Mitigation Measures: No mitigation is required.

[1] California Department of Forestry and Fire, *Los Angeles County Fire Hazard Severity Zones in SRA*, November 6, 2007, https://osfm.fire.ca.gov/media/6705/fhszs_map19.pdf, accessed March 17, 2020.

d) Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?

No Impact. Refer to Response 4.20(a).

Mitigation Measures: No mitigation is required.

4.21 MANDATORY FINDINGS OF SIGNIFICANCE

Would the project:	Potentially Significant Impact	Less Than Significant Impact With Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?				✓
b. Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)?				✓
c. Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?				✓

a) Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?

No Impact. As detailed in Section 4.4, *Biological Resources*, the City has a variety of wildlife habitats and natural communities, including parks, nature preserves, and water body areas, utilized by many native and migratory wildlife species. Similarly, as described in Section 4.5, *Cultural Resources* and 4.18, *Tribal Cultural Resources*, the City has a number of local, State, and Federally-listed historic properties as well as the potential for archaeological resources to be present.

The project proposes to add Chapter 18.78, *Construction in the Vicinity of Oil Wells*, and Chapter 18.79, *Methane Gas Mitigation*, to Title 18 of the LBMC. These chapters would provide development standards, mitigation, and procedures to allow for future development in the vicinity of oil wells. Overall, the proposed amendments represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. Nevertheless, future development subject to the LBMC amendments analyzed herein would be subject to biological, cultural, and tribal cultural resources review in accordance with City standards. As such, the project is not anticipated to eliminate important examples of the major periods of California history or prehistory. No impacts would occur in this regard.

b) Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)?

No Impact. The proposed amendments to Title 18 of the LBMC represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts. Development occurring under the proposed LBMC amendments would not contribute to any cumulative growth effects beyond what has been anticipated in the General Plan. Overall, the project would have neither individual nor cumulatively considerable environmental impacts.

c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?

No Impact. Previous sections of this Initial Study reviewed the proposed project's potential impacts related to aesthetics, air quality, geology and soils, greenhouse gases, hydrology/water quality, noise, hazards and hazardous materials, traffic, and other issues. As concluded in these previous discussions, the proposed LBMC amendments represent standards for future applicable projects, and no development or structures are proposed that would have a potential to result in environmental impacts or cause substantial adverse effects on human beings. No impacts would occur in this regard.

5.0 REFERENCES

The following references were utilized during preparation of this Initial Study. These documents are available for review at the City of Long Beach Development Services Department, located at 411 West Ocean Boulevard, 3rd Floor, Long Beach, California 90802.

1. California Air Resources Board and U.S. Environmental Protection Agency, *Ambient Air Quality Standards,* http://www.arb.ca.gov/research/aaqs/aaqs2.pdf, May 4, 2016.

2. California Department of Conservation Division of Mines and Geology, *Generalized Mineral Land Classification Map of Los Angeles County – South Half*, 1994, ftp://ftp.consrv.ca.gov/pub/dmg/pubs/ofr/OFR_94-14/OFR_94-14_Plate1B.pdf, accessed March 16, 2020.

3. California Department of Conservation Division of Land Resource Protection, *Los Angeles County Williamson Act FY 2015/2016*, 2016.

4. California Department of Conservation Farmland Mapping and Monitoring Program, *California Important Farmland Finder,* https://maps.conservation.ca.gov/dlrp/ciff/, accessed March 4, 2020.

5. California Department of Fish and Wildlife Service, *California Natural Community Conservation Plans*, April 2019, https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=68626&inline, accessed March 4, 2020.

6. California Department of Forestry and Fire, *Los Angeles County Fire Hazard Severity Zones in SRA*, November 6, 2007, https://osfm.fire.ca.gov/media/6705/fhszs_map19.pdf, accessed March 17, 2020.

7. California Department of Transportation, *California Scenic Highway Mapping System*, http://www.dot.ca.gov/hq/LandArch/16_livability/scenic_highways/, accessed March 4, 2020.

8. California Department of Water Resources, *California's Groundwater Bulletin 118, Coastal Plain of Los Angeles Groundwater Basin, Central Subbasin*, February 27, 2004.

9. California Department of Water Resources, *California's Groundwater Bulletin 118, Coastal Plain of Los Angeles County Groundwater Basin, West Coast Subbasin*, February 27, 2004.

10. California Department of Water Resources, *SGMA Basin Prioritization Dashboard*, https://gis.water.ca.gov/app/bp-dashboard/p2/, accessed March 4, 2020.

11. California Environmental Protection Agency, *Cortese Listing*, https://calepa.ca.gov/sitecleanup/corteselist/, accessed March 4, 2020.

12. California Geologic Energy Management Division, *Well Search: Los Angeles County, Long Beach Field*, https://secure.conservation.ca.gov/WellSearch, accessed February 19, 2020.

13. California Geological Survey, *Earthquake Zones of Required Investigation Long Beach Quadrangle*, March 25, 1999, http://gmw.conservation.ca.gov/SHP/EZRIM/Maps/LONG_BEACH_EZRIM.pdf, accessed March 4, 2020.

14. California Geological Survey, *Tsunami Inundation Map for Emergency Planning, Long Beach Quadrangle*, March 1, 2009.

15. California Geological Survey, *Tsunami Inundation Map for Emergency Planning, Los Alamitos/Seal Beach Quadrangle*, March 15, 2009.

16. City of Long Beach, *City of Long Beach Federal Emergency Management Agency (FEMA) Flood Zones*, effective September 26, 2008.

17. City of Long Beach, *City of Long Beach General Plan*, last updated December 2019.

18. City of Long Beach, *City of Long Beach Municipal Code*, codified through Ordinance No. ORD-20-0004, enacted January 21, 2020.

19. City of Long Beach, *Long Beach Parks, Recreation and Marine Department Website*, http://www.longbeach.gov/park/, accessed March 17, 2020.

20. City of Long Beach, *Historic Districts*, http://www.longbeach.gov/lbds/planning/preservation/districts/, accessed March 4, 2020

21. City of Long Beach, *Historic Landmarks*, http://www.longbeach.gov/lbds/planning/preservation/historic-landmarks2/, accessed March 4, 2020.

22. City of Long Beach Police Department, *Police Reporting Districts with Divisions & Beats Map*, http://www.longbeach.gov/globalassets/ti/media-library/documents/gis/map-catalog/36x36-citymap_with_policedivisions_beats_rd, accessed March 17, 2020.

23. City of Long Beach, *City of Long Beach Zoning Districts*, http://www.longbeach.gov/globalassets/lbds/media-library/documents/planning/maps/zoning-maps/50-by-50-zoning-map-2018-september, accessed March 4, 2020.

24. Google Earth Pro, 2020.

25. Los Angeles County Airport Land Use Commission, *Long Beach Airport, Airport Influence Area Map*, May 13, 2003, http://planning.lacounty.gov/assets/upl/project/aluc_airport-long-beach.pdf, accessed March 4, 2020.

26. Water Replenishment District of Southern California, *Groundwater Basins Master Plan*, September 2016.

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