



April 3, 2023

Mr. Luis Lopez

Contract Planner-Civic Solution

City of Moreno Valley

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Subject: Gateway Heights Project, Mitigated Negative Declaration, SCH # 2023020680, City of Moreno Valley, Riverside County

Dear Mr. Lopez:

The California Department of Fish and Wildlife (CDFW) received a Mitigated Negative Declaration (MND) from the City of Moreno Valley (City) for the Gateway Heights Project (Project) for Ackerman Law PC (Project Applicant/Proponent) pursuant to the California Environmental Quality Act (CEQA) and CEQA Guidelines¹.

Thank you for the opportunity to provide comments and recommendations regarding those activities involved in the Project that may affect California fish and wildlife. Likewise, we appreciate the opportunity to provide comments regarding those aspects of the Project that CDFW, by law, may be required to carry out or approve through the exercise of its own regulatory authority under the Fish and Game Code.

CDFW ROLE

CDFW is California's Trustee Agency for fish and wildlife resources and holds those resources in trust by statute for all the people of the State [Fish & G. Code, §§ 711.7, subdivision (a) & 1802; Pub. Resources Code, § 21070; California Environmental Quality Act (CEQA) Guidelines, § 15386, subdivision (a)]. CDFW, in its trustee capacity, has jurisdiction over the conservation, protection, and management of fish, wildlife, native plants, and habitat necessary for biologically sustainable populations of those species (Id., § 1802). Similarly, for purposes of CEQA, CDFW is charged by law to provide, as available, biological expertise during public agency environmental review efforts, focusing specifically on projects and related activities that have the potential to adversely affect state fish and wildlife resources.

¹ CEQA is codified in the California Public Resources Code in section 21000 et seq. The "CEQA Guidelines" are found in Title 14 of the California Code of Regulations, commencing with section 15000.

CDFW is also submitting comments as a Responsible Agency under CEQA (Pub. Resources Code, § 21069; CEQA Guidelines, § 15381). CDFW expects that it may need to exercise regulatory authority as provided by the Fish and Game Code, including lake and streambed alteration regulatory authority (Fish & G. Code, § 1600 *et seq.*). Likewise, to the extent implementation of the Project as proposed may result in “take”, as defined by State law, of any species protected under the California Endangered Species Act (CESA) (Fish & G. Code, § 2050 *et seq.*), or CESA-listed rare plant pursuant to the Native Plant Protection Act (NPPA; Fish & G. Code, §1900 *et seq.*), CDFW recommends the Project proponent obtain appropriate authorization under the Fish and Game Code.

CDFW issued Natural Community Conservation Plan approval and take authorization in 2004 for the Western Riverside County Multiple Species Habitat Conservation Plan (MSHCP), as per Section 2800, *et seq.*, of the California Fish and Game Code. The MSHCP established a multiple species conservation program to minimize and mitigate habitat loss and the incidental take of covered species in association with activities covered under the permit. CDFW is providing the following comments as they relate to the Project’s consistency with the MSHCP and CEQA.

PROJECT DESCRIPTION AND SUMMARY

Description: The City of Moreno Valley (City; Lead Agency) and Pacific Communities Builder, Inc. (Project Applicant) are proposing the Gateway Heights Project (Project). The proposed Project will consist of the construction of 108 detached townhouse condominium units on 16.59 acres of the 32.56-acre Project Site. The Project includes a total of 3.1 acres of common open space, including trails and a 0.89-acre community park area at the center of the development. Also, the remaining 15.97 acres of the Project Site would be rezoned to Open Space and would be dedicated as conservation land.

In addition, the Project also includes the street widening of Morton Road and improvements of the easterly half of Morton Road; the installation of hillside drainage, inlets, and storm drain lines to intercept and convey stormwater either along existing flow paths or to the Project’s two combination detention and bioretention basins (e.g., Basins A and B); and the establishment and ongoing maintenance of 100-foot-wide fuel modification zones for most of the housing units.

Location: The Project site is located north of Jennings Court, east of Morton Road, with vacant land to the north and west in the City of Moreno Valley, Riverside County, California, in Township 2 South, Section 34, Range 4 West, of the U.S. Geological Survey 7.5” Riverside East, California topographic quadrangle map; Assessor’s Parcel Number 256-150-001.

COMMENTS AND RECOMMENDATIONS

Based on the documents for review, CDFW offers the comments and recommendations below to assist the City in adequately identifying, avoiding, and/or mitigating the Project's significant, or potentially significant, direct, and indirect impacts on fish and wildlife (biological) resources. Editorial comments or other suggestions are also included to improve the environmental document. CDFW recommends the measures or revisions below be included in a science-based monitoring program that contains adaptive management strategies as part of the Project's CEQA mitigation, monitoring and reporting program (Pub. Resources Code, § 21081.6; CEQA Guidelines, § 15097).

Western Riverside County Multiple Species Habitat Conservation Plan

Compliance with approved habitat plans, such as the MSHCP, is discussed in CEQA. Specifically, Section 15125(d) of the CEQA Guidelines requires that the CEQA document discuss any inconsistencies between a proposed project and applicable general plans and regional plans, including habitat conservation plans and natural community conservation plans. An assessment of the impacts to the MSHCP as a result of this Project is necessary to address CEQA requirements. The proposed Project occurs within the MSHCP area and is subject to the provisions and policies of the MSHCP.

The proposed Project occurs within the MSHCP area and is subject to the provisions and policies of the MSHCP. To be considered a covered activity, Permittees need to demonstrate that proposed actions are consistent with the MSHCP, the Permits, and the Implementing Agreement. The City is the Lead Agency and is signatory to the Implementing Agreement of the MSHCP. To demonstrate consistency with the MSHCP, as part of the CEQA review, the City shall ensure the Project pays Local Development Mitigation Fees and other relevant fees as set forth in Section 8.5 of the MSHCP; and demonstrates compliance with: 1) the Protection of Species Associated with Riparian/Riverine Areas and Vernal Pools (Section 6.1.2 of the MSHCP); 2) the Protection of Narrow Endemic Plant Species (Section 6.1.3 of the MSHCP); 3) the Urban/Wildlands Interface Guidelines (Section 6.1.4 of the MSHCP); 4) the policies set forth in Section 6.3.2; and 5) the Best Management Practices and the siting, construction, design, operation and maintenance guidelines as set forth in Section 7.0 and Appendix C of the MSHCP.

The MSHCP identifies that the California Department of Fish and Wildlife and the U. S. Fish and Wildlife Service (collectively known as the Wildlife Agencies) shall be notified in advance of approval of public and private projects for the identified MSHCP activities which includes the Protection of Species Associated with Riparian/Riverine Areas and Vernal Pools (Section 6.11 of the MSHCP). CDFW requests that to demonstrate compliance with the MSHCP, the County complete MSHCP implementation prior to adoption of the MND for the Project.

Specific Comments

Comment #1: Burrowing Owl

Issue: The Project may have a significant impact on burrowing owl (*Athene cunicularia*), a Species of Special Concern (SSC).

Specific impacts: Project construction and activities may result in injury or mortality of burrowing owl, disrupt natural burrowing owl breeding behavior, and reduce reproductive capacity. Also, the Project may impact breeding, wintering, and foraging habitat for the species. Habitat loss could result in local extirpation of the species and contribute to local, regional, and State-wide declines of burrowing owl.

Why impacts would occur: The MND and Appendix B identifies that protocol burrowing owl habitat surveys of the Project site were completed October 21, 2020, as described in the *2006 Burrowing Owl Survey Instructions for the Western Riverside Multiple Species Habitat Conservation Plan Area* and that no burrowing owls were seen or suitable habitat was found. Additional details (the survey dates, times, etc.) were provided regarding the burrowing owl surveys mentioned within the MND following the guidelines described in the “Burrowing Owl Survey Instructions for the Western Riverside Multiple Species Habitat Conservation Plan Area,” such as detailed results of the habitat assessment with photographs and a discussion of whether the project site contains suitable burrowing owl habitat and burrow locations.

BIO-1 would require a no-work buffer around nesting birds, which would apply to occupied burrowing owl burrows, both during the nesting season and outside breeding season to be determined by the biologist. However, no-work buffer could be an insufficient buffer from occupied burrows and adjacent foraging grounds given the types of disturbance associated with the Project. Burrowing owls could react to low level disturbances such as surveys, drive by, or minimal ground disturbance/excavation (Environment Canada 2009). The Project is proposing a buffer that may be more suitable for low level disturbances; however, the Project could generate noise and ground vibrations more consistent with medium to high level disturbance. Project construction would generate noise and ground vibrations during daytime and nighttime earthmoving activities, demolition, tunneling, spoils hauling, and operation of large machinery. A buffer from occupied burrows during these types of disturbances could result in burrowing owls abandoning active nests, potentially causing loss of eggs or developing young, and noise could cause birds to avoid suitable nesting habitat. Finally, a buffer would not protect important foraging habitat during burrowing owl nesting season.

Implementation of buffer “to the extent feasible” does not ensure that buffers will be required, which means that the mitigation proposed is not an enforceable requirement. Furthermore, CDFW’s 2012 Staff Report on Burrowing Mitigation (CDFG 2012) does not support relocating breeding burrowing owls as mitigation. Finally, CDFW does not issue permits for the take of nesting birds, nests, or eggs. BIO-1 does not provide any

performance standards suitable for successfully mitigating impacts on burrowing owl habitat. The mitigation measure proposed in the MND may not satisfy the CEQA standards for mitigation that formulation of mitigation measures shall not be deferred until some future date (CEQA Guidelines, § 15126.4).

Evidence impact would be significant: Burrowing owl is a SSC, an SSC is a species, subspecies, or distinct population of an animal native to California that currently satisfies one or more of the following (not necessarily mutually exclusive) criteria:

- is extirpated from the State or, in the case of birds, is extirpated in its primary season or breeding role;
- is listed as ESA-, but not CESA-, threatened, or endangered; meets the State definition of threatened or endangered but has not formally been listed;
- is experiencing, or formerly experienced, serious (noncyclical) population declines or range retractions (not reversed) that, if continued or resumed, could qualify it for State threatened or endangered status; and/or,
- has naturally small populations exhibiting high susceptibility to risk from any factor(s), that if realized, could lead to declines that would qualify it for CESA threatened or endangered status (CDFW 2022b). CEQA provides protection not only for ESA and CESA-listed species, but for any species including but not limited to SSC which can be shown to meet the criteria for State listing. These SSC meet the CEQA definition of rare, threatened, or endangered species (CEQA Guidelines, § 15380). In addition, migratory nongame native bird species are protected by international treaty under the Federal Migratory Bird Treaty Act (MBTA) of 1918 (Code of Federal Regulations, Title 50, § 10.13). Sections 3503, 3503.5, and 3513 of the California Fish and Game Code prohibit take of all birds and their active nests including raptors and other migratory nongame birds (as listed under the Federal MBTA). It is unlawful to take, possess, or needlessly destroy the nest or eggs of any raptor.

In California, burrowing owls are in decline primarily because of habitat loss, as well as disease, predation, and drought. Burrowing owls require specific soil and microhabitat conditions, occur in few locations within a broad habitat category of grassland and some forms of agricultural land, require a relatively large home range to support their life history requirements, occur in relatively low numbers, and are semi-colonial.

The Project's impact on burrowing owl has yet to be mitigated below a significant level. Accordingly, the Project continues to have a substantial adverse effect, either directly or through habitat modifications, on a species identified as a candidate, sensitive, or special-status species by CDFW.

Recommended Potentially Feasible Mitigation Measure(s):

Mitigation Measure #1: To avoid take of active burrowing owl burrows (nests), CDFW requests the City include the following mitigation measures in the MND per below (edits are in ~~strike through~~ and **bold**), and also included in Attachment 1 “Mitigation Monitoring and Reporting Program.

MM-Bio 2: To avoid project-related impacts to burrowing owls potentially occurring on or in the vicinity of the project site, the Developer shall have a qualified biologist conduct a **project-specific habitat assessments and** pre-construction survey for burrowing owl in accordance with the March 2006 Burrowing Owl Survey Instructions for the Western Riverside County Multiple Species Habitat Conservation Plan Area. This survey shall occur within 30 days prior to ground-disturbance activities (**e.g., vegetation clearing, clearing, and grubbing, tree removal, site watering**) **within those portions of the project site containing suitable burrowing owl habitat.** ~~A minimum of one survey site visit within the described time frame prior to disturbance is required to confirm presence or absence of owls on the site.~~ **If ground disturbing activities in these areas are delayed or suspended for more than 30 days after the pre- construction survey, the area shall be resurveyed for owls. The results of the survey should be submitted to the City and California Department of Fish and Wildlife within three days of survey completion. In addition, a preconstruction survey for burrowing owl shall be conducted within 3 days prior to initiation of Project activities and reported to CDFW as described above.**

If no burrowing owls are observed during the survey, site preparation and construction activities may begin. If burrowing owl are present within the survey area, ~~take of active nests shall be avoided as determined by a qualified biologist.~~ **then avoidance or minimization measures shall be undertaken in consultation with the City of Moreno Valley, California Department of Fish and Wildlife (CDFW) and US Fish and Wildlife Service (USFWS). CDFW shall be sent written notification within 48 hours of detection of burrowing owls. If active nests are identified on the Project site, the Project applicant shall not commence activities until it can be determined that the burrows are not being used by adult or juvenile owls or following CDFW approval of a Burrowing Owl Plan as described below. If owl presence is difficult to determine, a qualified biologist shall monitor the burrows with motion-activated trail cameras for at least 24 hours to evaluate burrow occupancy. The onsite qualified biologist will verify the nesting effort has finished according to methods identified in the Burrowing Owl Plan.**

The qualified biologist and Project Applicant shall coordinate with the City, CDFW, and USFWS to develop a Burrowing Owl Plan to be approved by the City, CDFW, and USFWS prior to commencing Project activities. The Burrowing Owl Plan shall describe proposed avoidance, relocation, monitoring, minimization, and/or mitigation actions. The Burrowing Owl Plan shall include the number and location of occupied burrow sites and details on proposed buffers if avoiding the burrowing owls or information on the adjacent or nearby suitable habitat available to owls for relocation. If no suitable habitat is available nearby for relocation, details regarding the habitat characteristics of the proposed relocation site, creation and funding of artificial burrows (numbers, location, and type of burrows) and management activities for relocated owls shall also be included in the Burrowing Owl Plan. The City shall implement the Burrowing Owl Plan following CDFW and USFWS review and approval.

If burrowing owls are observed within Project Site(s) during Project implementation and construction, the Project applicant shall notify CDFW immediately in writing within 72 hours of detection. A Burrowing Owl Plan shall be submitted to CDFW for review and approval within two weeks of detection and no Project activity shall continue within 1000 feet of the burrowing owls until CDFW approves the Burrowing Owl Plan. The City shall be responsible for implementing appropriate avoidance and mitigation measures, including burrow avoidance, passive or active relocation, or other appropriate mitigation measures as identified in the Burrowing Owl Plan.

A final report shall be prepared by the qualified biologist documenting the results of the burrowing owl surveys and detailing avoidance, minimization, and mitigation measures. The final report shall be submitted to the City and CDFW within 30 days of completion of the survey and burrowing monitoring for mitigation monitoring compliance record keeping.

Comment #2: Nesting Birds

Issue: The Project may have a significant impact on nesting birds, including Species of Special Concern and fully protected species, that are subject to Fish and Game Code section 3513 and the Migratory Bird Treaty Act of 1918.

Specific impact: Project implementation could result in the loss of nesting and/or foraging habitat for passerine and raptor species from the removal of vegetation onsite.

Why impacts would occur: Project activities could result in temporary or long-term loss of suitable nesting and foraging habitats. Construction during the breeding season of nesting birds could potentially result in the incidental loss of breeding success or

otherwise lead to nest abandonment. Noise from road use, generators, and heavy equipment may disrupt nesting bird mating calls or songs, which could impact reproductive success (Patricelli and Blickley 2006, Halfwerk et al. 2011). Noise has also been shown to reduce the density of nesting birds (Francis et al. 2009), and songbird abundance and density was significantly reduced in areas with high levels of noise (Bayne et al. 2008). Additionally, noise exceeding 70 dB(A) may affect feather and body growth of young birds (Kleist et al. 2018). In addition to construction activities, residential development and increased human presence in the Project site could contribute to nesting bird impacts.

The timing of the nesting season varies greatly depending on several factors, such as the bird species, weather conditions in any given year, and long-term climate changes (e.g., drought, warming, etc.). CDFW staff have observed that changing climate conditions may result in the nesting bird season occurring earlier and later in the year than historical nesting season dates. CDFW recommends the completion of nesting bird survey regardless of time of year to ensure compliance with all applicable laws pertaining to nesting and to avoid take of nests.

The duration of a pair to build a nest and incubate eggs varies considerably, therefore, CDFW recommends surveying for nesting behavior and/or nests and construction within three days prior to start of Project construction to ensure all nests on site are identified and to avoid take of nests. Without appropriate species-specific avoidance measures, biological construction monitoring may be ineffective for detecting nesting birds. This may result in Take of nesting birds. Project ground-disturbing activities such as grading and grubbing may result in habitat destruction, causing the death or injury of adults, juveniles, eggs, or hatchlings. In addition, the Project may remove habitat by eliminating native vegetation that may support essential foraging and breeding habitat.

Evidence impacts would be significant: It is the Project proponent's responsibility to avoid Take of all nesting birds. Fish and Game Code section 3503 makes it unlawful to take, possess, or needlessly destroy the nest or eggs of any bird, except as otherwise provided by Fish and Game Code or any regulation made pursuant thereto. Fish and Game Code section 3513 makes it unlawful to take or possess any migratory nongame bird except as provided by the rules and regulations adopted by the Secretary of the Interior under provisions of the Migratory Bird Treaty Act of 1918, as amended (16 U.S.C. § 703 et seq.). Fish and Game Code section 3503.5 makes it unlawful to take, possess, or destroy any birds in the orders Falconiformes or Strigiformes (birds-of-prey) to take, possess, or destroy the nest or eggs of any such bird except as otherwise provided by Fish and Game Code or any regulation adopted pursuant thereto. These regulations apply anytime nests or eggs exist on the Project site.

Recommended Potentially Feasible Mitigation Measure(s):

Mitigation Measure #1: To address the above issues and help the Project applicant avoid unlawfully taking of nesting birds, CDFW requests the City include the following

mitigation measures in the MND per below (edits are in ~~strikethrough~~ and **bold**), and also included in Attachment 1 “Mitigation Monitoring and Reporting Program.

MM-Bio 1: To maintain compliance with the Migratory Bird Treaty Act (**MBTA** and California Fish and Game Code **Sections 3503, 3503.5, and 3513**, **site preparation activities (ground disturbance, construction activities, staging equipment, and/or vegetation removal activities-for the project shall be avoided, to the greatest extent possible, during the nesting bird season.** ~~if~~ ground-disturbing and/or vegetation clearance activities are scheduled to occur during the avian nesting season (~~typically February 15 through August 31~~), a pre- construction nesting bird survey shall be conducted by a qualified biologist within the Project Site and a 500-foot buffer around the Project Site. Surveys shall be conducted within 3 days prior to initiation of activity and shall be conducted between dawn and noon. **The survey results shall be provided to the City’s Planning Department. The Project Applicant shall adhere to the following:**

- 1. Applicant shall designate a biologist (Designated Biologist) experienced in: identifying local and migratory bird species of special concern; conducting bird surveys using appropriate survey methodology; nesting surveying techniques, recognizing breeding and nesting behaviors, locating nests and breeding territories, and identifying nesting stages and nest success; determining/establishing appropriate avoidance and minimization measures; and monitoring the efficacy of implemented avoidance and minimization measures.**
- 2. Pre-activity field surveys shall be conducted at the appropriate time of day/night, during appropriate weather conditions, no more than 3 days prior to the initiation of Project activities. Surveys shall encompass all suitable areas including trees, shrubs, bare ground, burrows, cavities, and structures. Survey duration shall take into consideration the size of the Project site; density, and complexity of the habitat; number of survey participants; survey techniques employed; and shall be sufficient to ensure the data collected is complete and accurate.**

If nesting birds are not found within the project site, site preparation and construction activities may begin during the nesting/breeding season. ~~If an active nest~~ **nesting birds (including nesting raptors is** are detected ~~during the nesting bird survey,~~ **then avoidance or minimization measures shall be undertaken in consultation with the City of Moreno Valley and California Department of Fish and Wildlife. Measures shall include immediate establishment of an** avoidance buffers shall be implemented as determined by a qualified biologist **and approved by the**

City of Moreno Valley, based on their best professional judgement and experience. The buffer shall be of a distance to ensure avoidance of adverse effects to the nesting bird by accounting for topography, ambient conditions, species, nest location, and activity type. **The buffer around the nest shall be delineated and flagged, and no construction activity shall occur within the buffer area until a qualified biologist determines nesting species have fledged and the nest is no longer active or the nest has failed. The biologist shall monitor the nest at the onset of project activities, and at the onset of any changes in such project activities (e.g., increase in number or type of equipment, change in equipment usage, etc.) to determine the efficacy of the buffer. If the biologist determines that such project activities may be causing an adverse reaction, the biologist shall adjust the buffer accordingly or implement alternative avoidance and minimization measures, such as redirecting or rescheduling construction or erecting sound barriers. All work within these buffers will be halted until the nesting effort is finished (i.e., the juveniles are surviving independent from the nest).** All nests shall be monitored as determined by the qualified biologist until nestlings have fledged and dispersed or it is otherwise confirmed that the nest has been unsuccessful or abandoned. **Work can resume within these avoidance areas when no other active nests are found. Upon completion of the survey and nesting bird monitoring, a report shall be prepared and submitted to City of Moreno Valley Planning Division for mitigation monitoring compliance record keeping.**

Comment #3: Impacts to Aquatic and Riparian/Riverine Resources; Lake and Streambed Alteration Agreement (LSAA) and Protection of Species Associated with Riparian/Riverine Areas and Vernal Pools.

Issue: Based on review of material submitted with the MND and review of aerial photography the Project has the potential to impact fish and wildlife resources subject to Fish and Game Code section 1600 et seq. and the Protection of Species Associated with Riparian/Riverine Areas and Vernal Pools (MSHCP Section 6.1.2).

Specific Impact: The MND identified several drainages subject to Fish and Game Code section 1602 throughout the Project site that are hydrologically connected to the Santa Ana River, generally flowing in a northeast to southwest direction. These drainages would also be subject to the Protection of Species Associated with Riparian/Riverine Areas and Vernal Pools (MSHCP Section 6.1.2). The Project includes the installation of hillside drainage, inlets, and storm drain lines to intercept and convey stormwater either along existing flow paths or to the Project's two combination detention and bioretention basins that are designed to connect downstream to two natural drainage courses. Project impacts include the cut and fill of slopes as close as eight feet to the edge of avoided drainages. The MND and Appendix B state that the portions of drainages will be avoided, however, Project activities have the potential to impact fish

and wildlife resources through the capture of storm water from existing flow paths and deposition of debris, sediment spoils, waste or other materials that could pass into any river, stream, or lake. Further, additional edge effects such as construction impacts, fuel modification, noise, trespass, and lighting may occur during construction and post-construction. After occupation of the Project site, edge effects such as fuel modification, trespass, invasive species, lighting, and noise may permanently degrade the avoided riparian/riverine areas.

Why Impact Would Occur: Project-related activities could potentially alter drainage patterns and water quality within, upstream, and downstream of the Project site, including: volume, velocity, and frequency of existing and post-Project surface flows; polluted runoff; soil erosion and/or sedimentation in streams and water bodies; and post-Project fate of runoff from the Project site.

The MSHCP identifies that if riparian/riverine habitat is avoided then measures should be incorporated into the Project design to ensure the long-term conservation of the areas to be avoided, and associated functions and values, through the use of deed restrictions, conservation easement, or other appropriate mechanisms. However, no discussion of measures that will protect the long-term conservation value of the avoided riparian/riverine areas after construction were included in the MND. The MND does not identify a realty instrument that protects the long-term conservation value of avoided areas.

The MSHCP identifies that treatment of edge effects should be addressed as part of the avoidance and minimization process to ensure avoided riparian/riverine areas maintain long-term conservation values (MSHCP Section 6.1.2, page 6-24).

Evidence Impact Would Be Significant: The Project may substantially adversely affect the existing stream pattern and geomorphologic processes of the Project site through the deposition of debris, waste or other materials that could pass into any river, stream or lake. Depending on how the Project is designed and constructed, it is likely that the Project applicant will need to notify CDFW per Fish and Game Code section 1602. Fish and Game Code section 1602 requires an entity to notify CDFW prior to commencing any activity that may do one or more of the following: substantially divert or obstruct the natural flow of any river, stream or lake; substantially change or use any material from the bed, channel or bank of any river, stream, or lake; or deposit debris, waste or other materials that could pass into any river, stream or lake. Please note that “any river, stream or lake” includes those that are episodic (i.e., those that are dry for periods of time) as well as those that are perennial (i.e., those that flow year-round). This includes ephemeral streams, desert washes, and watercourses with a subsurface flow.

Upon receipt of a complete notification, CDFW determines if the proposed Project activities may substantially adversely affect existing fish and wildlife resources and whether a Lake and Streambed Alteration (LSA) Agreement is required. An LSA

Agreement includes measures necessary to protect existing fish and wildlife resources. CDFW may suggest ways to modify the project that would eliminate or reduce harmful impacts to fish and wildlife resources.

CDFW's issuance of an LSA Agreement is a "project" subject to CEQA (see Pub. Resources Code, § 21065). To facilitate issuance of an LSA Agreement, if necessary, the MND should fully identify the potential impacts to the lake, stream, or riparian resources, and provide adequate avoidance, mitigation, and monitoring and reporting commitments. Early consultation with CDFW is recommended, since modification of the proposed Project may be required to avoid or reduce impacts to fish and wildlife resources. To obtain a Lake or Streambed Alteration notification package, please go to <https://www.wildlife.ca.gov/Conservation/LSA/Forms>.

Recommended potentially feasible mitigation measure(s):

Mitigation Measure #1: To ensure the long-term conservation values of avoided riparian/riverine areas are protected and to demonstrate consistency with the MSHCP's policy for the Protection of Species Associated with Riparian/Riverine Areas and Vernal Pools (MSHCP Section 6.1.2) a recordation of a deed restriction, conservation easement, or other appropriate mechanisms is required.

CDFW requests that to demonstrate consistency with the MSHCP, the City should condition the Project Applicant to record a deed restrictions, conservation easement, or other appropriate mechanisms over avoided riparian/riverine resources and recommends the inclusion of the following measure in the MND per the edits below (edits are in strikethrough and **bold**), and also included in Attachment 1 "Mitigation Monitoring and Reporting Program".

MM BIO-XX: To ensure long-term conservation of avoided riparian/riverine resources the Project Applicant will record a deed restriction, conservation easement, or other appropriate mechanisms over avoided riparian/riverine resources on the Project Site. The recorded realty instrument shall be provided to the City prior to grading.

Mitigation Measure #2: To ensure compliance with Fish and Game Code section 1602 CDFW recommends that the City condition the MND to include a mitigation measure for consultation with CDFW to determine if Fish and Game Code section 1600 et seq. resources may occur within the proposed Project alignment.

CDFW recommends the inclusion of the following measure in the MND per the edits below (edits are in ~~strikethrough~~ and **bold**), and also included in Attachment 1 "Mitigation Monitoring and Reporting Program":

MM BIO-4: The Applicant proposes to compensate for impacts to MSHCP riparian/riverine areas by providing a 1:1 ratio of re- establishment or a 2:1 ratio of rehabilitation credits at Riverpark Mitigation Bank. If credits at

Riverpark Mitigation Bank are not available prior to grading, the Developer shall compensate for impacts to jurisdictional waters and riparian/riverine areas by providing a 34:1 ratio of offsite land within the Santa Ana Watershed ~~or an adjacent watershed~~ to be acquired for the purpose of In-Perpetuity Preservation, or through the purchase of mitigation credits at an established off-site Mitigation Bank in **Western Riverside County** ~~or In-lieu Fee Program~~. Mitigation proposed on land acquired for the purpose of in-perpetuity mitigation that is not part of an agency-approved mitigation bank or in-lieu fee program shall include the preservation, creation, restoration, and/or enhancement of similar habitat within the Santa Ana Watershed ~~or an adjacent watershed~~ pursuant to a Habitat Mitigation and Monitoring Plan (HMMP) to be approved by the Lead and Responsible agencies. The HMMP shall be prepared prior to any impacts, and it shall provide details as to the implementation of mitigation, maintenance, future monitoring, and management. The goal of the mitigation shall be to preserve, create, restore, and/or enhance similar habitat with equal or greater function and value than the affected habitat.

Comment #4: Impacts to MSHCP Conservation Areas (Urban/Wildlands Interface Guidelines)

Issue: Based on review of material submitted with the MND and review of tentative site plans, the Project may result in edge effects that will adversely affect biological resources within the MSHCP Conservation Area.

Specific Impact: The Project site is adjacent Criteria Cell 637, which is located in Cell Group A, Subunit 1, Box Springs East for the Reche Canyon/Badlands Area Plan. Proposed land uses adjacent to conserved lands placed under a conservation easement as well as lands that are designated as MSHCP Conserved Public Quasi-Public Lands. Projects that are adjacent to MSHCP Conservation Areas are required to incorporate barriers, in individual Project designs to minimize unauthorized public access, domestic animal predation, illegal trespass, and dumping in the MSHCP Conservation Area. The proposed development could increase trespass onto the Conservation Area from unauthorized uses which can lead to habitat loss and degradation, increase fire hazards, increased predation, and spread of invasive species. In addition, the proposed Project may result in a substantial amount of noise through road use, equipment, and other project-related activities that may adversely affect wildlife species in several ways.

Why Impact Would Occur: As the MSHCP Conservation Area is assembled, boundaries are established between development and MSHCP Conservation Areas. Development near the MSHCP Conservation Area may result in edge effects that will adversely affect biological resources within the MSHCP Conservation Area. The Planning Species for the Reche Canyon/ Badlands Area Plan, Subunit 1 (Box Springs East) include many avian species, including Bell's sage sparrow, cactus wren, loggerhead shrike, and California rufous-crowned sparrow that are vulnerable to

invasive predators such as cats. Free-ranging domestic cats are estimated to kill 1.3 to 4.0 billion birds annually in the United States (Loss et. al. 2013). The proposed Project's domestic cat population may strongly reduce the avian population size and affect the of survival of the populations of several MSHCP covered animal species inside the Conservation Area unless an effective cat barrier is erected between the proposed development and the Conservation Area.

In addition, the proposed Project may result in a substantial amount of noise through road use, equipment, and other project-related activities. This may adversely affect wildlife species in several ways as wildlife responses to noise can occur at exposure levels of only 55-60 dB (Barber et al. 2009). (For reference, normal conversation is approximately 60 dB, and natural ambient noise levels (e.g., forest habitat) are generally measured at less than 50dB.)

Evidence the impact would be significant: Excessive or uncontrolled access within the MSHCP Conservation Area can result in habitat degradation and disruption of breeding and other critical wildlife functions at certain times of the year. Both human access and the potential for wildlife ignition from human activity can result species displacement and invasive species introduction. Human use of and divergence from designated trails can have a significant effect on trailside native communities. Trampling may lead to a reduction in vegetation cover, reduced plant height, a change in predominant growth forms, and a change in composition to favor more resistant species (Goldsmith et al. 1970, Liddle 1975). In addition, human activity is a significant vector for non-native species introductions as invasive species commonly invade disturbed areas such as roads due to recurrent access by humans and the creation of available space (Mack et al. 2000, Tyser and Worley 1992, Knops et al.1995, and Vitousek et al.1997). Trails, including unofficial trails created by uncontrolled access to conservation lands, are also documented to be conduits for weedy annuals that increase fire frequency (Mack et al. 2000, Tyser and Worley 1992, and Knops et al.1995) and are therefore often specifically managed for weeds. Effects on mammals from human activity and fire are also complex, stemming from both direct mortality and avoidance or attraction to burned areas. Loss of habitat due to fire could potentially magnify effects of disturbance associated with other human activity in adjacent unburned areas due to the loss of suitable habitat and by altering the spatial distribution of species across the conserved land.

In addition, anthropogenic noise can disrupt the communication of many wildlife species including frogs, birds, and bats (Sun and Narins 2005, Patricelli and Blickley 2006, Gillam and McCracken 2007, Slabbekoorn and Ripmeester 2008). Noise can also affect predator-prey relationships as many nocturnal animals such as bats and owls primarily use auditory cues (i.e., hearing) to hunt. Additionally, many prey species increase their vigilance behavior when exposed to noise because they need to rely more on visual detection of predators when auditory cues may be masked by noise (Rabin et al. 2006, Quinn et al. 2017). Noise has also been shown to reduce the density of nesting birds

(Francis et al. 2009) and cause increased stress that results in decreased immune responses (Kight and Swaddle 2011).

To control public access and other urban threats such as pets, invasive species, fire, etc. CDFW requests a fencing plan that includes the erection of a cat-proof barrier. The barrier should consist of 8-foot-tall fencing made of secure and fire-proof materials (such as brick, stone, or metal) placed along the entire boundary adjacent to conservation area to prohibit movement of people and pets from the development area into the conservation area. The top of all walls and fences should be designed to prevent animals from entering conservation areas using systems such as a roller bars, angled fence tops, or other effective fence designs to keep out pets, especially cats. No section of the fence should include clear panels or sections such as glass or plastic as these are a strike hazards to birds which fly into them and die (Loss et. al. 2014). This type of fencing would also prevent residents from creating openings and unauthorized access through the walls into to the conservation areas. The MND does not include a discussion of how the Project would control public access and other urban threats. The measures do not provide details on the specific type and placement of the barrier or how it will be effective in controlling trespass. CDFW requests specific language be added into the Mitigation Measures to elaborate on what protective barriers will be put in place to ensure adjacent conservation areas are adequately protected from the proposed adjacent development and Project construction activities.

Recommended potentially feasible mitigation measure(s):

Mitigation Measure #1: To minimize edge effects and maintain conservation values within the Conservation Areas, the County is required to implement the Urban/Wildlands Interface Guidelines (MSHCP Section 6.1.4) to minimize harmful effects from drainage, toxics, lighting, noise, invasives, barriers, and grading/land development. The MSHCP identifies that Project review and impact mitigation be provided through the CEQA process to address the Urban/Wildland Interface guidelines. CDFW recommends that the MND include an analysis of edge effects related to project construction and operation, such as noise, lighting, trespass, and toxics and that Project specific mitigation measures to avoid and minimize any effects be included in the MND.

To minimize impacts on wildlife in the adjacent Criteria Cell, CDFW requests inclusion of the following new measure in the MND (added text shown in bold): Avoidance and minimization measures can include, but are not limited to:

MM BIO-XX: The Project Applicant shall comply with the following prior to approval of the Final Design:

- 1. Noise Plan: Prior to approval of the Final Design, a Noise plan shall be submitted to the City of Moreno Valley for review and approval. The Noise Plan shall identify noise generating land uses that may affecting the MSHCP Conservation Area and shall incorporate setbacks, berms or walls to minimize the effects of noise on MSHCP Conservation Area resources**

pursuant to applicable rules, regulations and guidelines related to land use noise standards. The MSHCP identifies that Project noise impacts do not exceed the residential standards within the Conservation Areas. For planning purposes, wildlife within the MSHCP Conservation Area should not be subject to noise that would exceed residential noise standards. The Noise Plan shall include monitoring during construction and post-project to demonstrate noise levels in the Conservation Area do not exceed residential standards. If noise standards are exceeded, the Project Applicant is responsible for immediate implementation of remedial actions to reduce noise levels to acceptable levels.

- 2. Landscaping Plan: develop a landscaping plan that includes the use of native plant material on the Project site and avoids the use of invasive plant species identified in Table 6-2 of the MSHCP for landscaping portions of development that are adjacent to the MSHCP Conservation Area including avoided riparian/riverine resources. Prior to approval of the Final Design, a landscaping plan, using native vegetation, for areas adjacent to the Conservation Area shall be submitted to the City for review and approval.**
- 3. Barrier and Fencing Plan: A Barrier and Fencing plan that provides specific details designed to minimize unauthorized public access, domestic animal predation, illegal trespass, and dumping in the MSHCP Conservation Area. Prior to approval of the Final Design, a fencing plan shall be submitted to the City of Moreno Valley and the Western Riverside County Regional Conservation Authority for review and approval. The fencing plan shall include 8-foot-tall fencing made of secure and fire-proof materials (such as brick, stone, or metal) placed along the entire boundary adjacent to Conservation Area to prohibit movement of people and pets from the development area into the Conservation Area. The top of all walls and fences shall be designed to prevent animals from entering Conservation Areas using systems such as a roller bars, angled fence tops, or other effective fence designs to keep out pets, especially cats. To prevent bird strikes and reduce bird mortality, no section of the fence should include clear panels or be made of transparent materials such as glass or plastic. The Fencing Plan shall identify a maintenance and monitoring plan for the fence, including who is responsible for fence maintenance with sufficient funding to maintain the barrier.**
- 4. Grading/Land Development – Manufactured slopes associated with proposed site development shall not extend into the MSHCP Conservation Area.**
- 5. Best Management Practices: The MND should incorporate the guidance in MSHCP Section 7.0 and Appendix C of the MSHCP for addressing Best**

Management Practices.

Mitigation Measure #2: To minimize impacts on wildlife in the adjacent Criteria Cell, CDFW requests inclusion of the following new measure in the MND (added text shown in bold):

MM NOI-[XX]: Construction-related and long-term Project operation noise shall not exceed 65 dBA Leq in the adjacent MSHCP Criteria Cell. Prior to issuance of land development permits, including clearing or grubbing and grading and/or construction permits for areas within or adjacent to the MSHCP Criteria Cell, the applicant shall prepare and submit to the satisfaction of the City, an acoustical analysis to demonstrate that the 65 dBA Leq noise level is not exceeded in the Criteria Cell. The acoustical analysis shall describe the methods by which construction noise shall not exceed 65 dBA Leq and how noise levels will be monitored during construction and for the life of the project. Noise abatement methods may include, but are not limited to, reoperation of specific construction activities, installation of noise abatement at the source, and/or installation of noise abatement at the receiving areas.

Comment #5: Lighting (Urban/Wildlands Interface Guidelines)

Issue: The Project may have a significant impact on adjacent MSHCP Conservation Areas from increased artificial lighting. Artificial lighting that does not conform to wildlife-friendly lighting guidelines often results in light pollution, which has the potential to significantly and adversely affect fish and wildlife.

Specific impact: Potential impacts from the proposed Project include light and glare from interior and exterior building lighting, safety and security lighting, and vehicular traffic accessing the proposed Project Site that will occur once the site is built and would introduce a new source of light into the adjacent Conservation Area

Why impacts would occur: Nighttime lighting has the potential to indirectly affect wildlife use and activity in the Criteria Cell 637. Shielded lighting will produce a glow, and with enough lights, may increase the ambient light level in the area at night. Species may be subject to increased predation from diurnal predators foraging for longer periods due to light from the adjacent development as well as increased visual acuity of nocturnal predators. The MND does not identify species that may be more vulnerable to increased predation from increased visibility and other impacts of adjacent lighting.

The MND identifies that the proposed Project would be developed in accordance with the applicable City regulations and would be subject to City approval. Exterior lighting would be hooded and arranged to reflect away from adjoining properties and streets per City requirements (e.g., Section 9.16.280). Regulatory requirement RR AES-1 requires the development of a lighting plan for the Project, which would ensure that lighting

impacts would be less than significant. However, the MND provides limited detail on shielded lighting in RR AES-1 and lacks specific, technical details on the type of lighting along the Conservation Area boundary. The MND does not provide data on existing ambient lighting conditions and does not analyze the impacts of the lighting on the adjacent Conservation Area. The MND does not demonstrate that the proposed RR AES-1 measure will be sufficient to offset the impacts of Project-related lighting on the Conservation Area.

Evidence the impact would be significant: Artificial lighting and the resulting light pollution alter ecological processes including, but not limited to, the temporal niches of species; the repair and recovery of physiological function; the measurement of time through interference with the detection of circadian and lunar and seasonal cycles; and the detection of resources and natural enemies and navigation (Gatson et al. 2013). Many species use photoperiod cues for communication (e.g., bird song; Miller 2006), determining when to begin foraging (Stone et al. 2009), behavior thermoregulation (Beiswenger 1977), and migration (Longcore and Rich 2004). Phototaxis, a phenomenon which results in attraction and movement towards light, can disorient, entrap, and temporarily blind wildlife species that experience it (Longcore and Rich 2004). Further, many of the effects of artificial nighttime lightning on population- or ecosystem-level processes are still poorly known.

Recommended potentially feasible mitigation measure(s):

Mitigation Measure #1: To minimize lighting impacts on wildlife in the adjacent Criteria Cell, CDFW requests revision of RR AES-1 in the MND (added text shown in bold).

RR AES-1: The Developer shall prepare a Lighting Plan that provides the type and location of proposed exterior lighting and signage, subject to the review and approval of the City's Development Services Department. All new lighting shall be shielded and down-cast, such that the light is not cast onto adjacent properties or visible from above. **Night lighting shall be directed away from the MSHCP Conservation Area to protect species within the MSHCP Conservation Area from direct and indirect night lighting. Prior to approval of the Final Design, an analysis of potential impacts from light and glare from interior and exterior building lighting, safety and security lighting, and vehicular traffic accessing the site shall be submitted to the City for review and approval. This analysis shall demonstrate that due to shielded and directional lighting in compliance with Mt. Palomar lighting standards, no lighting shall be introduced into the adjacent Conservation Area. If potential lighting impacts are identified, the lighting design (placement, light spectrum, and shielding), or other design solutions acceptable to the City of Moreno Valley shall be implemented to eliminate lighting impacts on the adjacent Conservation Areas. Shielding, including Turtle Bay type LED lighting, shall be incorporated into Project designs to ensure ambient lighting in the MSHCP Conservation Area is not increased. The Lighting**

Plan shall include monitoring during construction and post-project to demonstrate lighting levels do not increase in the Conservation Area. If light standards are exceeded, the Project Applicant is responsible for immediate implementation of remedial actions to reduce light levels to acceptable levels identified in the Lighting Plan.

ADDITIONAL RECOMMENDATIONS

Weed Management Plan. A weed management plan should be developed for the Project site and implemented during the duration of this long-term Project. On-going soil disturbance promotes establishment and growth of non-native weeds. As part of the Project, non-native weeds should be prevented from becoming established. The Projects site should be monitored via mapping for new introductions and expansions of non-native weeds.

Mitigation and Monitoring Reporting Plan

CDFW recommends updating the MND's proposed Biological Resources Mitigation Measures to include mitigation measures recommended in this letter. Mitigation measures must be fully enforceable through permit conditions, agreements, or other legally binding instruments [(Pub. Resources Code, § 21081.6; CEQA Guidelines, § 15126.4(a)(2)]. As such, CDFW has provided comments and recommendations to assist the City in developing mitigation measures that are (1) consistent with CEQA Guidelines section 15126.4; (2) specific; (3) detailed (i.e., responsible party, timing, specific actions, location), and (4) clear for a measure to be fully enforceable and implemented successfully via mitigation, monitoring, and/or reporting program (Pub. Resources Code, § 21081.6; CEQA Guidelines, § 15097). The City is welcome to coordinate with CDFW to further review and refine the Project's mitigation measures. Per Public Resources Code section 21081.6(a)(1), CDFW has provided the City with a summary of our suggested mitigation measures and recommendations in the form of an attached Draft Mitigation and Monitoring Reporting Plan (MMRP; Attachment 1).

ENVIRONMENTAL DATA

CEQA requires that information developed in environmental impact reports and negative declarations be incorporated into a database which may be used to make subsequent or supplemental environmental determinations. (Pub. Resources Code, § 21003, subd. (e).) Accordingly, please report any special status species and natural communities detected during Project surveys to the California Natural Diversity Database (CNDDDB). The CNDDDB field survey form can be filled out and submitted online at the following link: <https://wildlife.ca.gov/Data/CNDDDB/Submitting-Data>. The types of information reported to CNDDDB can be found at the following link: <https://www.wildlife.ca.gov/Data/CNDDDB/Plants-and-Animals>.

ENVIRONMENTAL DOCUMENT FILING FEES


The Project, as proposed, would have an impact on fish and/or wildlife, and assessment of environmental document filing fees is necessary. Fees are payable upon filing of the Notice of Determination by the Lead Agency and serve to help defray the cost of environmental review by CDFW. Payment of the environmental document filing fee is required in order for the underlying project approval to be operative, vested, and final. (Cal. Code Regs, tit. 14, § 753.5; Fish & G. Code, § 711.4; Pub. Resources Code, § 21089.)

CONCLUSION

CDFW appreciates the opportunity to comment on the MND for the Gateway Heights Project, State Clearinghouse No. 2023020680 to assist in identifying and mitigating Project impacts on biological resources. CDFW personnel are available for consultation regarding biological resources and strategies to minimize impacts. CDFW requests that the City of Moreno Valley addresses CDFW's comments and concerns prior to adoption of the MND for the Project.

Questions regarding this letter or further coordination should be directed to Katrina Rehrer, Environmental Scientist, at katrina.rehrer@wildlife.ca.gov.

Sincerely,

DocuSigned by:

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Environmental Program Manager

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REFERENCES

- Barber, J. R., K. R. Crooks, and K. M. Fristrup. 2009. The costs of chronic noise exposure for terrestrial organisms. *Trends in Ecology and Evolution* 25:180–189.
- Beiswenger, R. E. 1977. Diet patterns of aggregative behavior in tadpoles of *Bufo americanus*, in relation to light and temperature. *Ecology* 58:98–108.
- California Department of Fish and Game (CDFG). 2012. Staff report on burrowing owl mitigation. State of California, Natural Resources Agency. Available for download at: <https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=83843&inline=true>
- Francis, C.D., C.P. Ortega, and A. Cruz. 2009. Noise Pollution Changes Avian Communities and Species Interactions. *Current Biology* 19:1415–1419.
- Gillam, E. H., and G. F. McCracken. 2007. Variability in the echolocation of *Tadarida brasiliensis*: effects of geography and local acoustic environment. *Animal Behaviour* 74:277–286.
- Goldsmith, F.B, R.J.C Munton, and A. Warren. 1970. The impact of recreation on the ecology and amenity of semi-natural areas: methods of investigation used in the Isles of Scilly. *Biological Journal of the Linnaean Society* 2: 287-306.
- Halfwerk, W., L.J.M. Holleman, C. M Lessells, and H. Slabbekoorn. 2011. Negative Impact of Traffic Noise on Avian Reproductive Success. *Journal of Applied Ecology* 48:210–219.
- Johnson, P.T., A. R. Townsend, C. C. Cleveland, P. M Glibert, R. W. Howarth, V. J. McKenzie, E. Rejmankova, and M.H. Ward. 2010 Linking Environmental Nutrient Enrichment and Disease Emergence in Humans and Wildlife. *Ecological Applications*. 20(1):16–29.
<https://esajournals.onlinelibrary.wiley.com/doi/full/10.1890/08-0633.1>
- Kight, C. R., and J. P. Swaddle. 2011. How and why environmental noise impacts animals: An integrative, mechanistic review. *Ecology Letters* 14:1052–1061.
- Kleist, N. J., R. P. Guralnick, A. Cruz, C. A. Lowry, and C. D. Francis. 2018. Chronic Anthropogenic Noise Disrupts Glucocorticoid Signaling and has Multiple Effects on Fitness in an Avian Community. *Proceedings of the National Academy of Sciences* 115: E648–E657.
- Knops, J. M. H., J. R. Griffin, A. C. Royalty. 1995. Introduced and native plants of the Hastings reservation, central coastal california a comparison. *Biological Conservation* 71: 115-123

- Liddle, M. J. 1975. A selective review of the ecological effects of human trampling on natural ecosystems. *Biological Conservation* 7: 17-36
- Longcore, T., and C. Rich. 2004. Ecological light pollution - Review. *Frontiers in Ecology and the Environment* 2:191–198.
- Loss, S.R., T. Will, and P.P. Marra. 2013. The impact of free-ranging domestic cats on wildlife of the United States. *Nature Communications*. 4:1396 doi: 10.1038/ncomms2380.
- Loss, S. R., T. Will, S. S. Loss, and P.P. Marra. 2014. Bird-building collisions in the United States: estimates of annual mortality and species vulnerability. *The Condor* 116(1):8-23
- Mack, R. N., D. Simberloff, W. M. Lonsdale, H. Evans, M. Clout, F. A. Bazzaz. 2000. Biotic invasions: causes, epidemiology, global consequences, and control. *Ecological Applications* 10(3): 689-710.
- Miller, M. 2006. Apparent Effects of Light Pollution on Singing Behavior of American Robins. *The Condor*, 108(1), University of Florida.
- Nightingale, B., T. Longcore, and C. A. Simenstad. 2006. Artificial night lighting and fishes. Pages 257–276 in C. Rich and T. Longcore, editors. *Ecological consequences of artificial light at night*. Island Press, Washington, D.C., USA.
- Patricelli, G., and J. J. L. Blickley. 2006. Avian communication in urban noise: causes and consequences of vocal adjustment. *Auk* 123:639–649.
- Quinn, J. L., M. J. Whittingham, S. J. Butler, W. Cresswell, J. L. Quinn, M. J. Whittingham, S. J. Butler, W. Cresswell, and W. Noise. 2017. Noise, predation risk compensation and vigilance in the chaffinch *Fringilla coelebs*. *Journal of Avian Biology* 37:601–608.
- Rabin, L. A., R. G. Coss, and D. H. Owings. 2006. The effects of wind turbines on antipredator behavior in California ground squirrels (*Spermophilus beecheyi*). *Biological Conservation* 131:410–420.
- Slabbekoorn, H., and E. A. P. Ripmeester. 2008. Birdsong and anthropogenic noise: Implications and applications for conservation. *Molecular Ecology* 17:72–83.
- Stone, E. L., G. Jones, and S. Harris. 2009. Street lighting disturbs commuting bats. *Current Biology* 19:1123–1127. Elsevier Ltd.
- Sun, J. W. C., and P. M. Narins. 2005. Anthropogenic sounds differentially affect amphibian call rate. *Biological Conservation* 121:419–427.

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Tyser, R. W., C. A. Worley. 1992. Alien flora in grasslands adjacent to road and trail corridors in Glacier National Park, Montana (U.S.A.). *Conservation Biology* 6(2): 253-262.

Vitousek, P. M., C. M. D'Antonio, L. L. Loope, M. Rejmanek, R. Westerbrooks. 1997. Introduced species: a significant component of human-caused global change. *New Zealand Journal of Ecology* 21(1): 1-16

Western Riverside County Multiple Species Habitat Conservation Plan (RCA). 2006. Burrowing Owl Survey Instructions for the Western Riverside Multiple Species Habitat Conservation Plan Area. Available for download at:
https://www.wrcca.org/species/survey_protocols/burrowing_owl_survey_instructions.pdf



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GAVIN NEWSOM, Governor
CHARLTON H. BONHAM, Director



Attachment A: Draft Mitigation and Monitoring Reporting Plan

CDFW recommends the following language to be incorporated into a future environmental document for the Project. A final MMRP shall reflect results following additional plant and wildlife surveys and the Project’s final on and/or off-site mitigation plans.

Biological Resources (BIO)			
Mitigation Measure (MM)		Timing	Responsible Party
Burrowing Owl	<p>MM BIO-2: To avoid project-related impacts to burrowing owls potentially occurring on or in the vicinity of the project site, the Developer shall have a qualified biologist conduct a project-specific habitat assessments and pre-construction survey for burrowing owl in accordance with the March 2006 Burrowing Owl Survey Instructions for the Western Riverside County Multiple Species Habitat Conservation Plan Area. This survey shall occur within 30 days prior to ground-disturbance activities (e.g., vegetation clearing, clearing, and grubbing, tree removal, site watering) within those portions of the project site containing suitable burrowing owl habitat. If ground disturbing activities in these areas are delayed or suspended for more than 30 days after the pre- construction survey, the area shall be resurveyed for owls. The results of the survey should be submitted to the City and California Department of Fish and Wildlife within three days of survey completion. In addition, a preconstruction survey for burrowing owl shall be conducted within 3 days prior to initiation of Project activities and reported to CDFW as described above.</p> <p>If no burrowing owls are observed during the survey, site preparation and construction activities may begin. If burrowing owl are present within the survey area, then avoidance or minimization measures shall be undertaken in consultation with the City of</p>	<p>Prior to commencing ground- or vegetation disturbing activities</p>	<p>Project Proponent</p>

	<p>Moreno Valley, California Department of Fish and Wildlife (CDFW) and US Fish and Wildlife Service (USFWS). CDFW shall be sent written notification within 48 hours of detection of burrowing owls. If active nests are identified on the Project site, the Project applicant shall not commence activities until it can be determined that the burrows are not being used by adult or juvenile owls or following CDFW approval of a Burrowing Owl Plan as described below. If owl presence is difficult to determine, a qualified biologist shall monitor the burrows with motion-activated trail cameras for at least 24 hours to evaluate burrow occupancy. The onsite qualified biologist will verify the nesting effort has finished according to methods identified in the Burrowing Owl Plan.</p> <p>The qualified biologist and Project Applicant shall coordinate with the City, CDFW, and USFWS to develop a Burrowing Owl Plan to be approved by the City, CDFW, and USFWS prior to commencing Project activities. The Burrowing Owl Plan shall describe proposed avoidance, relocation, monitoring, minimization, and/or mitigation actions. The Burrowing Owl Plan shall include the number and location of occupied burrow sites and details on proposed buffers if avoiding the burrowing owls or information on the adjacent or nearby suitable habitat available to owls for relocation. If no suitable habitat is available nearby for relocation, details regarding the habitat characteristics of the proposed relocation site, creation and funding of artificial burrows (numbers, location, and type of burrows) and management activities for relocated owls shall also be included in the Burrowing Owl Plan. The City shall implement the Burrowing Owl Plan following CDFW and USFWS review and approval.</p> <p>If burrowing owls are observed within Project Site(s) during Project implementation and construction, the Project applicant shall notify CDFW immediately in writing within 72 hours of detection. A Burrowing Owl Plan shall be submitted to CDFW for review and approval within two weeks of detection and no Project activity shall</p>		
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	<p>continue within 1000 feet of the burrowing owls until CDFW approves the Burrowing Owl Plan. The City shall be responsible for implementing appropriate avoidance and mitigation measures, including burrow avoidance, passive or active relocation, or other appropriate mitigation measures as identified in the Burrowing Owl Plan.</p> <p>A final report shall be prepared by the qualified biologist documenting the results of the burrowing owl surveys and detailing avoidance, minimization, and mitigation measures. The final report shall be submitted to the City and CDFW within 30 days of completion of the survey and burrowing monitoring for mitigation monitoring compliance record keeping.</p>		
<p>Nesting Birds</p>	<p>MM-BIO-1: To maintain compliance with the Migratory Bird Treaty Act (MBTA and California Fish and Game Code Sections 3503, 3503.5, and 3513, site preparation activities (ground disturbance, construction activities, staging equipment, and/or vegetation removal activities-for the project shall be avoided, to the greatest extent possible, during the nesting bird season. If ground-disturbing and/or vegetation clearance activities are scheduled to occur during the avian nesting season, a pre- construction nesting bird survey shall be conducted by a qualified biologist within the Project Site and a 500-foot buffer around the Project Site. Surveys shall be conducted within 3 days prior to initiation of activity and shall be conducted between dawn and noon. The survey results shall be provided to the City’s Planning Department. The Project Applicant shall adhere to the following:</p> <ol style="list-style-type: none"> 1. Applicant shall designate a biologist (Designated Biologist) experienced in: identifying local and migratory bird species of special concern; conducting bird surveys using appropriate survey methodology; nesting surveying techniques, recognizing breeding and nesting behaviors, locating nests and breeding territories, and identifying nesting stages and 	<p>Prior to commencing ground- or vegetation disturbing activities</p>	<p>Project Proponent</p>

	<p>nest success; determining/establishing appropriate avoidance and minimization measures; and monitoring the efficacy of implemented avoidance and minimization measures.</p> <p>2. Pre-activity field surveys shall be conducted at the appropriate time of day/night, during appropriate weather conditions, no more than 3 days prior to the initiation of Project activities. Surveys shall encompass all suitable areas including trees, shrubs, bare ground, burrows, cavities, and structures. Survey duration shall take into consideration the size of the Project site; density, and complexity of the habitat; number of survey participants; survey techniques employed; and shall be sufficient to ensure the data collected is complete and accurate.</p> <p>If nesting birds are not found within the project site, site preparation and construction activities may begin during the nesting/breeding season. If nesting birds (including nesting raptors are detected, then avoidance or minimization measures shall be undertaken in consultation with the City of Moreno Valley and California Department of Fish and Wildlife. Measures shall include immediate establishment of an avoidance buffers shall be implemented as determined by a qualified biologist and approved by the City of Moreno Valley, based on their best professional judgement and experience. The buffer shall be of a distance to ensure avoidance of adverse effects to the nesting bird by accounting for topography, ambient conditions, species, nest location, and activity type. The buffer around the nest shall be delineated and flagged, and no construction activity shall occur within the buffer area until a qualified biologist determines nesting species have fledged and the nest is no longer active or the nest has failed. The biologist shall monitor the nest at the onset of project activities, and at the onset of any changes in such project activities (e.g., increase in number or type of equipment, change in</p>		
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	<p>equipment usage, etc.) to determine the efficacy of the buffer. If the biologist determines that such project activities may be causing an adverse reaction, the biologist shall adjust the buffer accordingly or implement alternative avoidance and minimization measures, such as redirecting or rescheduling construction or erecting sound barriers. All work within these buffers will be halted until the nesting effort is finished (i.e., the juveniles are surviving independent from the nest). All nests shall be monitored as determined by the qualified biologist until nestlings have fledged and dispersed or it is otherwise confirmed that the nest has been unsuccessful or abandoned. Work can resume within these avoidance areas when no other active nests are found. Upon completion of the survey and nesting bird monitoring, a report shall be prepared and submitted to City of Moreno Valley Planning Division for mitigation monitoring compliance record keeping.</p>		
<p>Impacts to Aquatic and Riparian Resources</p>	<p>MM BIO-XX: To ensure long-term conservation of avoided riparian/riverine resources the Project Applicant will record a deed restriction, conservation easement, or other appropriate mechanisms over avoided riparian/riverine resources on the Project Site. The recorded realty instrument shall be provided to the City prior to grading.</p>	<p>Prior to commencing ground- or vegetation disturbing activities</p>	<p>Project Proponent</p>
<p>Impacts to Aquatic and Riparian Resources</p>	<p>MM BIO-4: The Applicant proposes to compensate for impacts to MSHCP riparian/riverine areas by providing a 1:1 ratio of re-establishment or a 2:1 ratio of rehabilitation credits at Riverpark Mitigation Bank. If credits at Riverpark Mitigation Bank are not available prior to grading, the Developer shall compensate for impacts to jurisdictional waters and riparian/riverine areas by providing a 34:1 ratio of offsite land within the Santa Ana Watershed to be acquired for the purpose of In-Perpetuity Preservation, or through the purchase of mitigation credits at an established off-site Mitigation Bank in Western Riverside County. Mitigation proposed on land acquired for the purpose of in-</p>	<p>Prior to commencing ground- or vegetation disturbing activities</p>	<p>Project Proponent</p>

	<p>perpetuity mitigation that is not part of an agency-approved mitigation bank or in-lieu fee program shall include the preservation, creation, restoration, and/or enhancement of similar habitat within the Santa Ana Watershed pursuant to a Habitat Mitigation and Monitoring Plan (HMMP) to be approved by the Lead and Responsible agencies. The HMMP shall be prepared prior to any impacts, and it shall provide details as to the implementation of mitigation, maintenance, future monitoring, and management. The goal of the mitigation shall be to preserve, create, restore, and/or enhance similar habitat with equal or greater function and value than the affected habitat.</p>		
<p>Impacts to MSHCP Conservation Areas</p>	<p>MM BIO-XX: The Project Applicant shall comply with the following prior to approval of the Final Design:</p> <ol style="list-style-type: none"> 1. Noise Plan: Prior to approval of the Final Design, a Noise plan shall be submitted to the City of Moreno Valley for review and approval. The Noise Plan shall identify noise generating land uses that may affecting the MSHCP Conservation Area and shall incorporate setbacks, berms or walls to minimize the effects of noise on MSHCP Conservation Area resources pursuant to applicable rules, regulations and guidelines related to land use noise standards. The MSHCP identifies that Project noise impacts do not exceed the residential standards within the Conservation Areas. For planning purposes, wildlife within the MSHCP Conservation Area should not be subject to noise that would exceed residential noise standards. The Noise Plan shall include monitoring during construction and post-project to demonstrate noise levels in the Conservation Area do not exceed residential standards. If noise standards are exceeded, the Project Applicant is responsible for immediate implementation of remedial actions to reduce noise levels to acceptable levels. 	<p>Prior to commencing ground- or vegetation disturbing activities</p>	<p>Project Proponent</p>

	<p>2. Landscaping Plan: develop a landscaping plan that includes the use of native plant material on the Project site and avoids the use of invasive plant species identified in Table 6-2 of the MSHCP for landscaping portions of development that are adjacent to the MSHCP Conservation Area including avoided riparian/riverine resources. Prior to approval of the Final Design, a landscaping plan, using native vegetation, for areas adjacent to the Conservation Area shall be submitted to the City for review and approval.</p> <p>3. Barrier and Fencing Plan: A Barrier and Fencing plan that provides specific details designed to minimize unauthorized public access, domestic animal predation, illegal trespass, and dumping in the MSHCP Conservation Area. Prior to approval of the Final Design, a fencing plan shall be submitted to the City of Moreno Valley and the Western Riverside County Regional Conservation Authority for review and approval. The fencing plan shall include 8-foot-tall fencing made of secure and fire-proof materials (such as brick, stone, or metal) placed along the entire boundary adjacent to Conservation Area to prohibit movement of people and pets from the development area into the Conservation Area. The top of all walls and fences shall be designed to prevent animals from entering Conservation Areas using systems such as a roller bars, angled fence tops, or other effective fence designs to keep out pets, especially cats. To prevent bird strikes and reduce bird mortality, no section of the fence should include clear panels or be made of transparent materials such as glass or plastic. The Fencing Plan shall identify a maintenance and monitoring plan for the fence, including who is responsible for fence maintenance with sufficient funding to maintain the barrier.</p> <p>4. Grading/Land Development – Manufactured slopes</p>		
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	<p>associated with proposed site development shall not extend into the MSHCP Conservation Area.</p> <p>5. Best Management Practices: The MND should incorporate the guidance in MSHCP Section 7.0 and Appendix C of the MSHCP for addressing Best Management Practices.</p>		
Noise	<p>MM NOI-[XX]: Construction-related and long-term Project operation noise shall not exceed 65 dBA Leq in the adjacent MSHCP Criteria Cell. Prior to issuance of land development permits, including clearing or grubbing and grading and/or construction permits for areas within or adjacent to the MSHCP Criteria Cell, the applicant shall prepare and submit to the satisfaction of the City, an acoustical analysis to demonstrate that the 65 dBA Leq noise level is not exceeded in the Criteria Cell. The acoustical analysis shall describe the methods by which construction noise shall not exceed 65 dBA Leq and how noise levels will be monitored during construction and for the life of the project. Noise abatement methods may include, but are not limited to, reoperation of specific construction activities, installation of noise abatement at the source, and/or installation of noise abatement at the receiving areas.</p>	<p>Prior to commencing ground- or vegetation disturbing activities</p>	<p>Project Proponent</p>
Lighting	<p>RR AES-1: The Developer shall prepare a Lighting Plan that provides the type and location of proposed exterior lighting and signage, subject to the review and approval of the City's Development Services Department. All new lighting shall be shielded and down-cast, such that the light is not cast onto adjacent properties or visible from above. Night lighting shall be directed away from the MSHCP Conservation Area to protect species within the MSHCP Conservation Area from direct and indirect night lighting. Prior to approval of the Final Design, an analysis of potential impacts from light and glare from interior and exterior building lighting, safety and security lighting, and vehicular traffic accessing the site shall be submitted to the City for review</p>	<p>Prior to commencing ground- or vegetation disturbing activities</p>	<p>Project Proponent</p>

	<p>and approval. This analysis shall demonstrate that due to shielded and directional lighting in compliance with Mt. Palomar lighting standards, no lighting shall be introduced into the adjacent Conservation Area. If potential lighting impacts are identified, the lighting design (placement, light spectrum, and shielding), or other design solutions acceptable to the City of Moreno Valley shall be implemented to eliminate lighting impacts on the adjacent Conservation Areas. Shielding, including Turtle Bay type LED lighting, shall be incorporated into Project designs to ensure ambient lighting in the MSHCP Conservation Area is not increased. The Lighting Plan shall include monitoring during construction and post-project to demonstrate lighting levels do not increase in the Conservation Area. If light standards are exceeded, the Project Applicant is responsible for immediate implementation of remedial actions to reduce light levels to acceptable levels identified in the Lighting Plan.</p>		
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