Improve the State Route 57 and State Route 60 Confluence at Grand Avenue (State Route 57 Post Mile R4.3 to Post Mile R4.5; Post Mile R4.5 to Post Mile R4.8 and State Route 60 Post Mile R23.3 to Post Mile R26.5)

State Route 57/State Route 60 Confluence Project Programmatic Section 4(f) Evaluation

07-LA-57-PM-R4.3/R4.5 and R4.5/R4.8 07-LA-60-PM-R23.7/R26

EA 279100

Submitted Pursuant to:

49 USC 303

THE STATE OF CALIFORNIA

Department of Transportation as assigned

Date of Approval

Dawn Kukla Senior Environmental Planner

January 2013



The environmental review, consultation, and any other action required in accordance with applicable federal laws for this project is being, or has been, carried out by Caltrans under its assumption of responsibility pursuant to 23 USC 327.

Summary

This Section 4(f) evaluation has been prepared in accordance with 49 United States Code Section 303 and the Federal Highway Administration (FHWA) regulations for Section 4(f) compliance codified at 23 Code of Federal Regulations Part 774. This study evaluates the effects of two build alternatives, a combination cloverleaf/diamond interchange configuration alternative and a partial cloverleaf interchange configuration alternative, on a public golf course, Diamond Bar Golf Course. The combination cloverleaf/diamond interchange configuration alternative (Build Alternative 2) would require direct use of Diamond Bar Golf Course because of the permanent loss of approximately 7.3 acres of golf course property. The partial cloverleaf interchange configuration alternative (Build Alternative 3) would result in direct use of Diamond Bar Golf Course because of the permanent loss of approximately 10.1 acres of golf course property. The acquisition of land from the golf course would require compensation, either an in-lieu payment or replacement property of equal value. Additionally, several improvements and enhancements are proposed for the golf course, which would improve overall playability at the golf course. With these added benefits, the project would meet the criteria of FHWA's Section 4(f) Evaluation and Approval for Transportation Projects That Have a Net Benefit to a Section 4(f) Property (2005a). The lead agency (California Department of Transportation) has been in consultation with the County of Los Angeles (owner of Diamond Bar Golf Course) regarding potential effects on this Section 4(f) property (Diamond Bar Golf Course) as well as enhancements and measures to minimize harm. The County has agreed to the enhancements and measures to minimize harm and has concurred that the project would not result in any adverse environmental impacts that would permanently impair use of the publicly owned golf course.

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List of Abbreviated Terms

Caltrans	California Department of Transportation
CEQA	California Environmental Quality Act
CFR	Code of Federal Regulations
EA	environmental assessment
EIR	environmental impact report
EIS	environmental impact statement
FHWA	Federal Highway Administration
FTA	Federal Transit Administration
HOV	high-occupancy vehicle
LOS	level of service
MOU	memorandum of understanding
NEPA	National Environmental Policy Act
SAFETEA-LU	Safe, Accountable, Flexible, Efficient Transportation Equity Act of 2003: A Legacy for Users
SCAG	Southern California Association of Governments
SHPO	State Historic Preservation Officer
SR	state route
TCEs	temporary construction easements
THPO	Tribal Historic Preservation Officer
USC	United States Code
USDOT	U.S. Department of Transportation

Chapter 1 Introduction

Section 4(f) of the Department of Transportation Act of 1966, codified at 49 United States Code (USC) Section 303, declares that "[i]t is the policy of the United States government that special effort should be made to preserve the natural beauty of the countryside and public park and recreation lands, wildlife and waterfowl refuges, and historic sites."

Section 4(f) specifies that "[t]he Secretary [of Transportation] may approve a transportation program or project . . . requiring the use of publicly owned land of a public park, recreation area, or wildlife and waterfowl refuge of national, state, or local significance or land of a historic site of national, state, or local significance (as determined by the federal, state, or local officials having jurisdiction over the park, area, refuge, or site) only if

- 1. There is no prudent and feasible alternative to using that land, and
- 2. The program or project includes all possible planning to minimize harm to the park, recreation area, wildlife and waterfowl refuge, or historic site resulting from the use."

Section 4(f) further requires consultation with the Department of Interior and, as appropriate, the involved offices of the Department of Agriculture and the Department of Housing and Urban Development, as well as relevant state and local officials, in developing transportation projects and programs that use lands protected under Section 4(f).

A Memorandum of Understanding between the California Department of Transportation (Caltrans) and the Federal Highway Administration (FHWA) took effect on October 1, 2012 continuing the National Environmental Policy Act (NEPA) Assignment program that was the Pilot program. This MOU is in effect until 18 months after the implementation of regulations pursuant to 23 U.S.C. 327(b)(2). Therefore, Caltrans will be the administrator of Section 4(f) for this project.

The proposed project (and alternatives) is a transportation project that may receive federal funding and/or discretionary approvals through the U.S. Department of Transportation (USDOT) (i.e., FHWA); therefore, documentation of compliance with Section 4(f) is required.

This Section 4(f) evaluation has been prepared in accordance with FHWA regulations for Section 4(f) compliance codified at 23 CFR Part 774. Additional guidance has been obtained from *FHWA Technical Advisory T 6640.8A* (1987) and the revised *FHWA Section 4(f) Policy Paper* (2005b).

1.1 Section 4(f) "Use"

As defined in 23 CFR Section 774.17, the use of a protected Section 4(f) resource occurs when any of the following conditions are met:

• Land is permanently incorporated into a transportation facility through partial or full acquisition (i.e., "direct use");

- There is a temporary occupancy of land that is adverse in terms of the preservationist purposes of Section 4(f) (i.e., "temporary occupancy"); or
- There is no permanent incorporation of land, but the proximity of a transportation facility results in impacts so severe that the protected activities, features, or attributes that qualify the resource for protection under Section 4(f) are substantially impaired (i.e., "constructive use").

1.1.1 Nationwide Programmatic Section 4(f) Evaluations

USDOT and FHWA have determined that certain highway projects may comply with the requirements of Section 4(f) under a nationwide programmatic evaluation rather than an individual evaluation. Five nationwide programmatic Section 4(f) evaluations are available. One covers projects that use historic bridges. The second covers projects that use minor amounts of land from parks, recreational lands, or wildlife and waterfowl refuges. The third covers projects that use minor amounts of land from historic sites. The fourth covers bikeway projects. The fifth applies when there is a net benefit to a Section 4(f) property. As detailed below, the proposed project meets the applicability criteria found in FHWA's Section 4(f) Evaluation and Approval for Transportation Projects That Have a Net Benefit to a Section 4(f) Property.

Chapter 2 Proposed Action

This section describes the proposed action that was developed to meet the identified need while avoiding or minimizing environmental impacts. A description of the project alternatives follows in Sections 2.2.1 and 2.2.2.

2.1 Purpose and Need

Below is a summary of the purpose and need for the proposed project.

2.1.1 Project Purpose

The five primary objectives of the proposed project are as follows:

- Relieve congestion and delays on Grand Avenue from Golden Springs Drive to the interchange at SR-60.
- Relieve congestion and delays at the Grand Avenue interchange.
- Relieve congestion and delays on the SR-57/SR-60 freeway mainline.
- Improve safety by reducing weaving movements and increasing weaving distances along the SR-57/SR-60 confluence.

These primary objectives address the need to improve the operational deficiencies of the freeways at the Grand Avenue interchange.

2.1.2 Project Need

Forecast population and employment growth between 2008 and 2035 in the vicinity of the State Route (SR) 57 and SR-60 confluence is expected to result in traffic volumes that will be approximately 10% to 25% higher than existing volumes for SR-57/SR-60, including the recently constructed high-occupancy vehicle (HOV) lanes, according to traffic forecasts from the Southern California Association of Governments (SCAG) travel forecasting model. Forecast 2035 traffic volumes would result in further deterioration of freeway operation and the estimated level of service (LOS) for both westbound and eastbound travel.

Improvements to the SR-57/SR-60 confluence are needed to address operational deficiencies at the Grand Avenue interchange. Therefore, improvements are proposed for the SR-57/SR-60 confluence to accommodate expected traffic growth.

2.2 **Project Description**

The proposed project would reconfigure the approximately 2-mile confluence of SR-57 and SR-60, which would entail the addition of auxiliary lanes and associated on-ramp/off-ramp reconfigurations. SR-57 and SR-60 are major inter-regional freeways that link cities in the San Gabriel Valley and the Inland Empire with Los Angeles and Orange counties (see Figures 1 and 2).

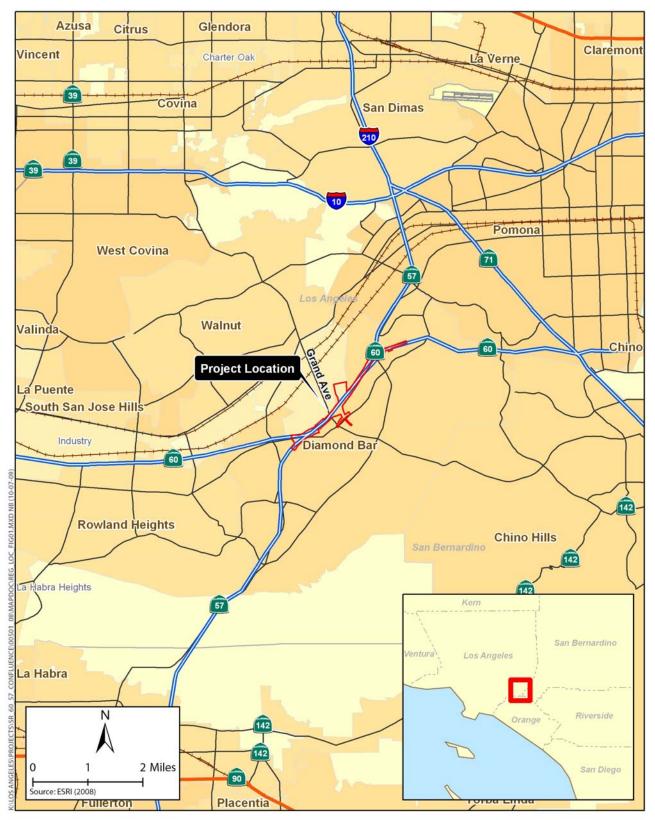
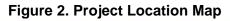
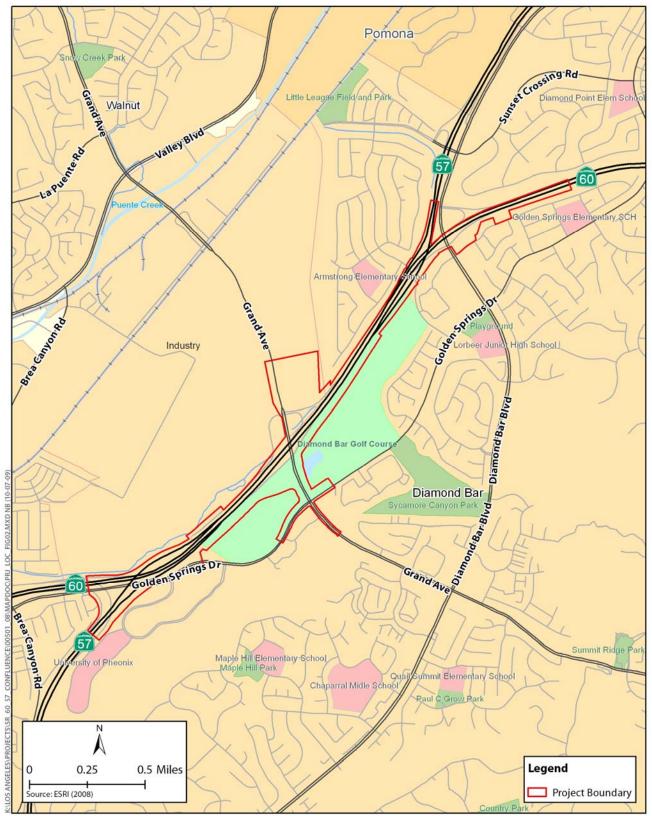


Figure 1. Regional Vicinity Map





2.2.1 Alternative 1: No-Build Alternative

The No-Build (or No-Action) Alternative would result in no structural or physical changes to SR-57, SR-60, or the Grand Avenue interchange. Existing deficient capacity and congestion conditions due to short weaving distances on SR-57, SR-60, and Grand Avenue would not change under this alternative.

2.2.2 Build Alternatives

Two build alternatives are being considered (i.e., Alternative 2: Combination Cloverleaf/ Diamond Interchange Configuration and Alternative 3: Partial Cloverleaf Interchange Configuration). Figures 3 and 4 illustrate the alignments for the build alternatives. Common elements of the two build alternatives are described below.

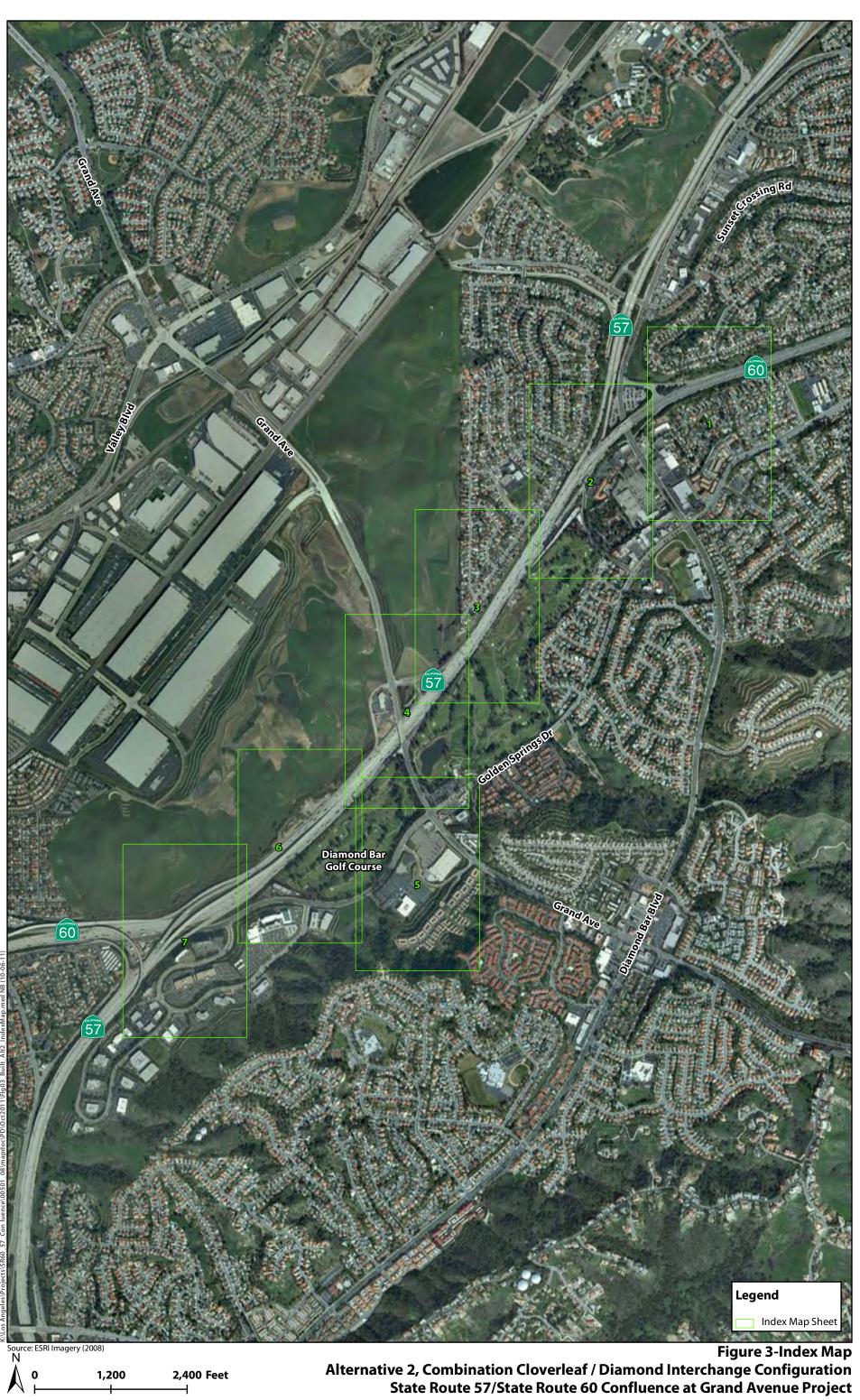
Under both build alternatives, a new bypass off-ramp is proposed for eastbound SR-60 west of the southern/western SR-57/SR-60 junction. The bypass off-ramp would be barrier separated from SR-57/SR-60 traffic until passing the SR-57 diverge to the Grand Avenue off-ramp. Northbound SR-57 traffic would exit to Grand Avenue by using an optional exit from the third SR-57 lane. The off-ramp lane would add to the one-lane eastbound SR-60 bypass off-ramp. The off-ramp would widen to three lanes at the final approach to the intersection at Grand Avenue.

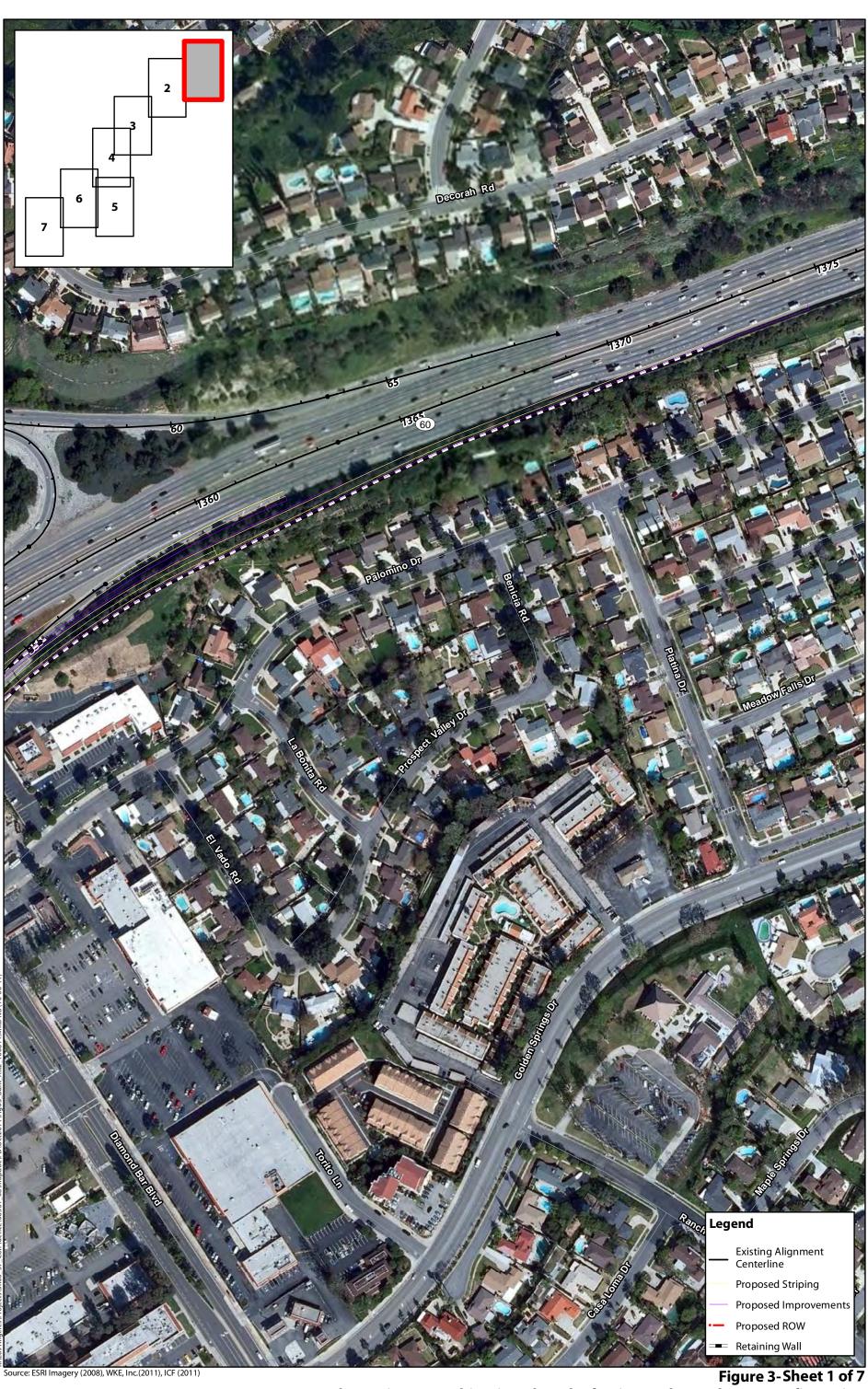
Currently, the third lane on SR-57 ends at the Grand Avenue off-ramp, then begins again 4,200 feet to the east. The build alternatives would both add this lane between the Grand Avenue off-ramp and the additional lane near the SR-57 diverge at the east end. An auxiliary lane would be added adjacent to the added through lane to serve traffic entering from Grand Avenue.

At the east end of the confluence, a bypass connector would be built to connect the Grand Avenue eastbound on-ramp auxiliary lane with eastbound SR-60. This connector would require a new overcrossing structure at Prospector Road and Diamond Bar Boulevard as well as realignment of the Diamond Bar Boulevard on-ramp.

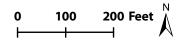
In the westbound direction, the dropped southbound SR-57 lane would be extended 2,500 feet to the realigned westbound SR-60 off-ramp to Grand Avenue, creating a two-lane exit ramp. The exit ramp would expand to five lanes at the intersection.

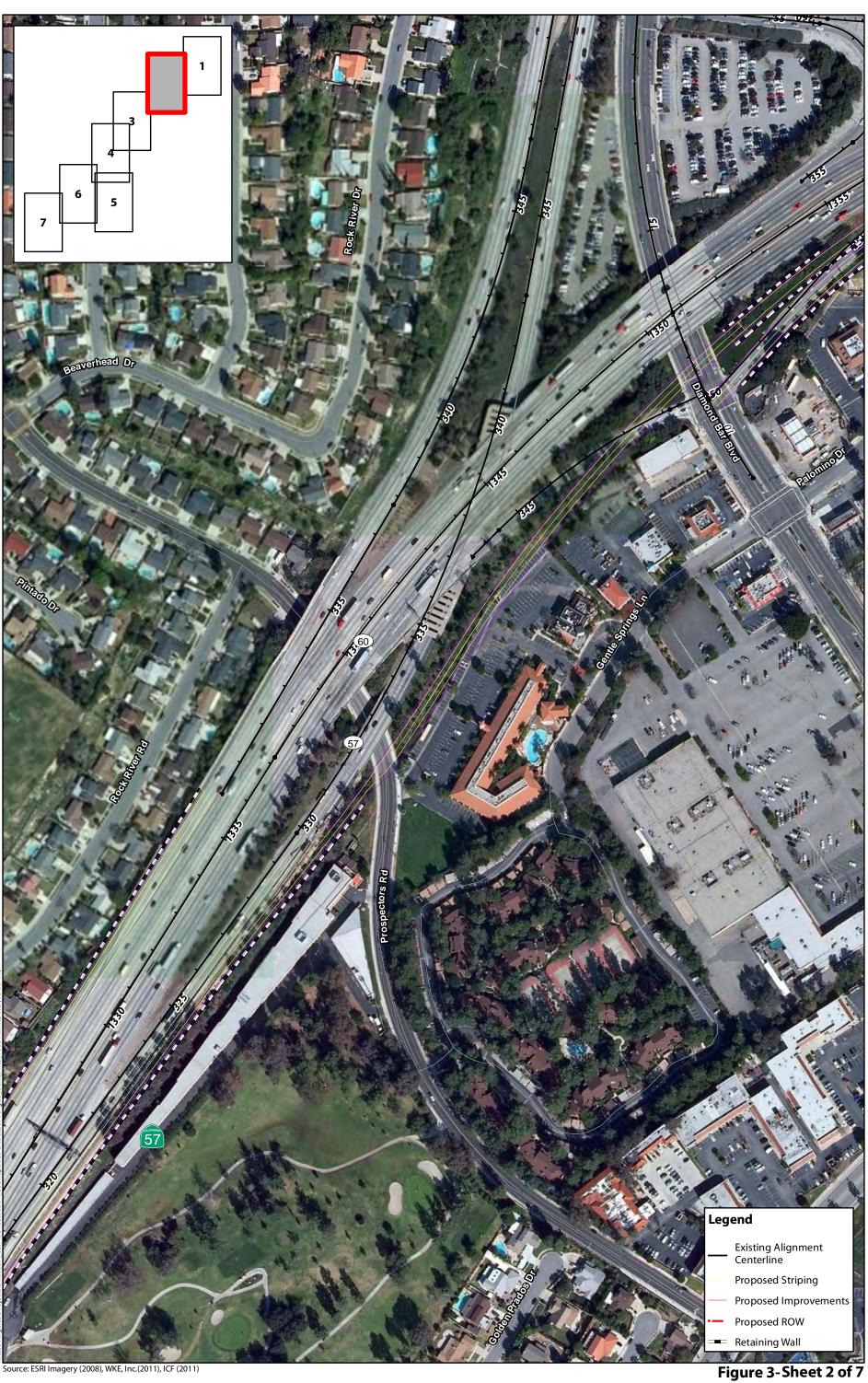
Operational improvements along Grand Avenue include widening the roadway from two through lanes in each direction to four through lanes in each direction under both build alternatives. Grand Avenue would be widened easterly, encroaching on the existing westbound loop on-ramp. Grand Avenue would be realigned approximately 50 feet east of the existing centerline to avoid a right-of-way acquisition from a vacant automobile dealership on Grand Avenue north of SR-60. The centerline shift of Grand Avenue would require the westbound off-ramp to be relocated approximately 100 feet north of the existing intersection on Grand Avenue. The intersection relocation would also require realignment of the two-lane westbound loop on-ramp as well as Old Brea Canyon Road (to be renamed Grand Crossing Parkway).





Source: ESRI Imagery (2008), WKE, Inc.(2011), ICF (2011)



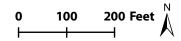


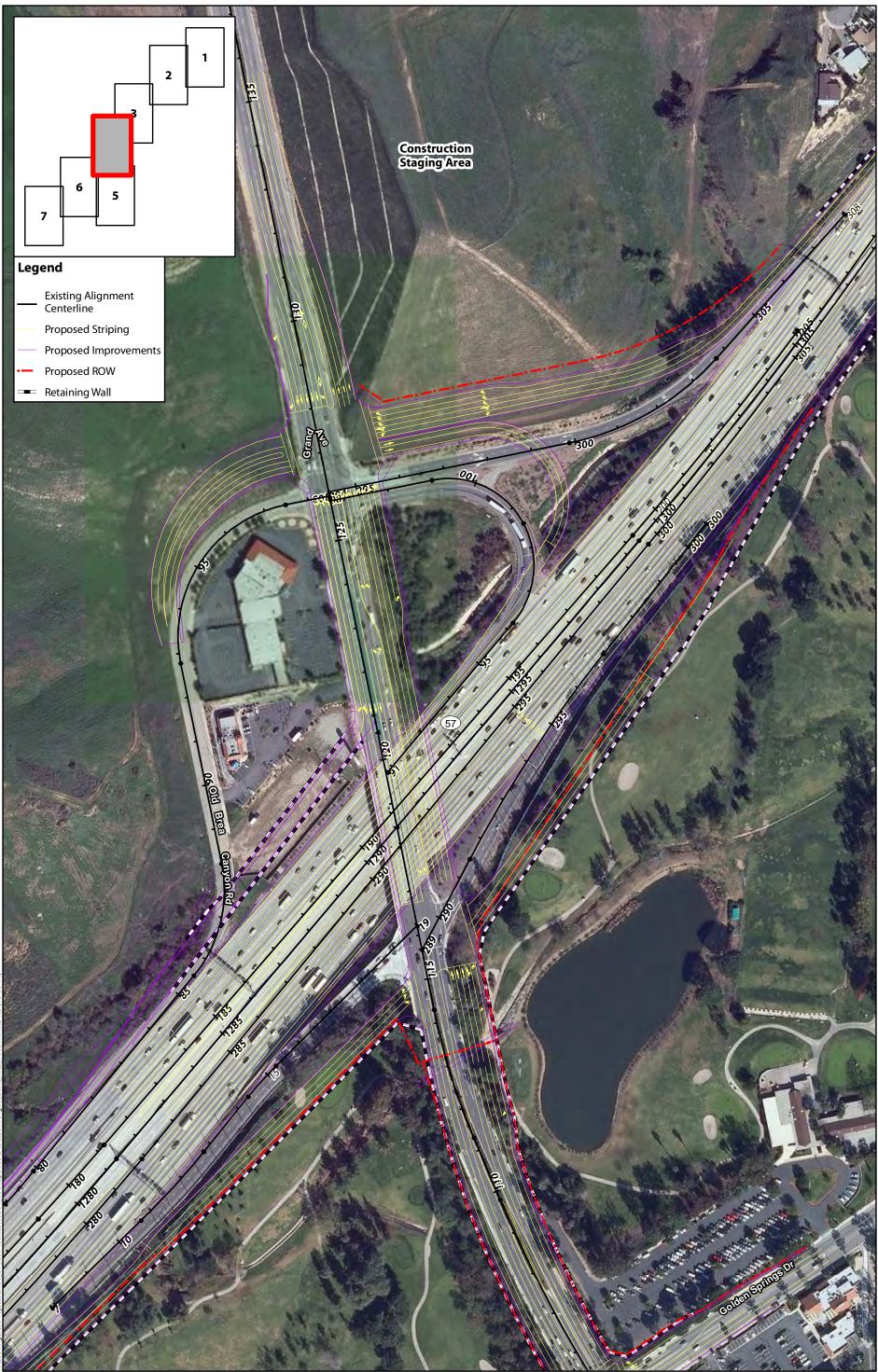
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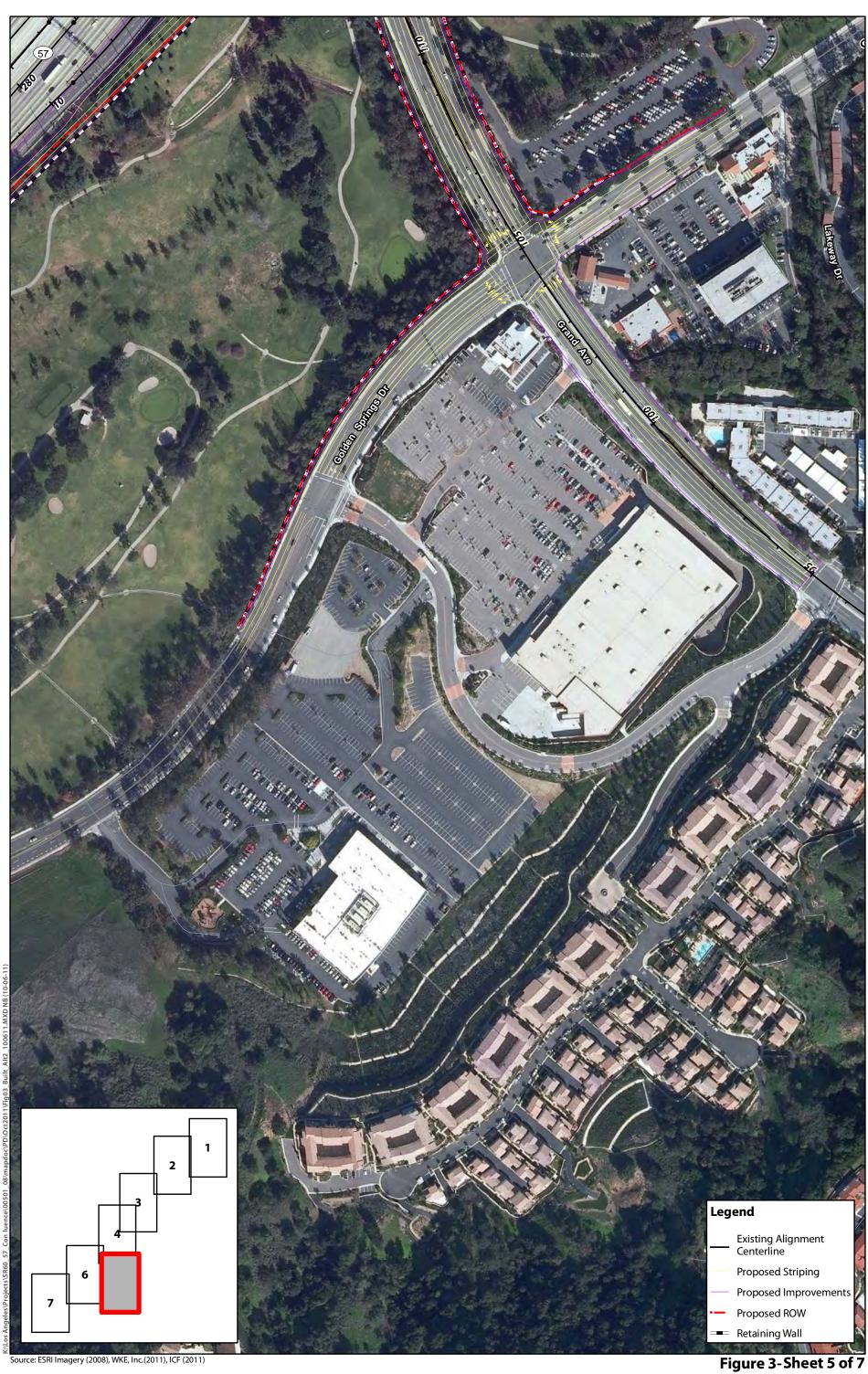
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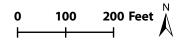


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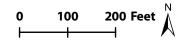


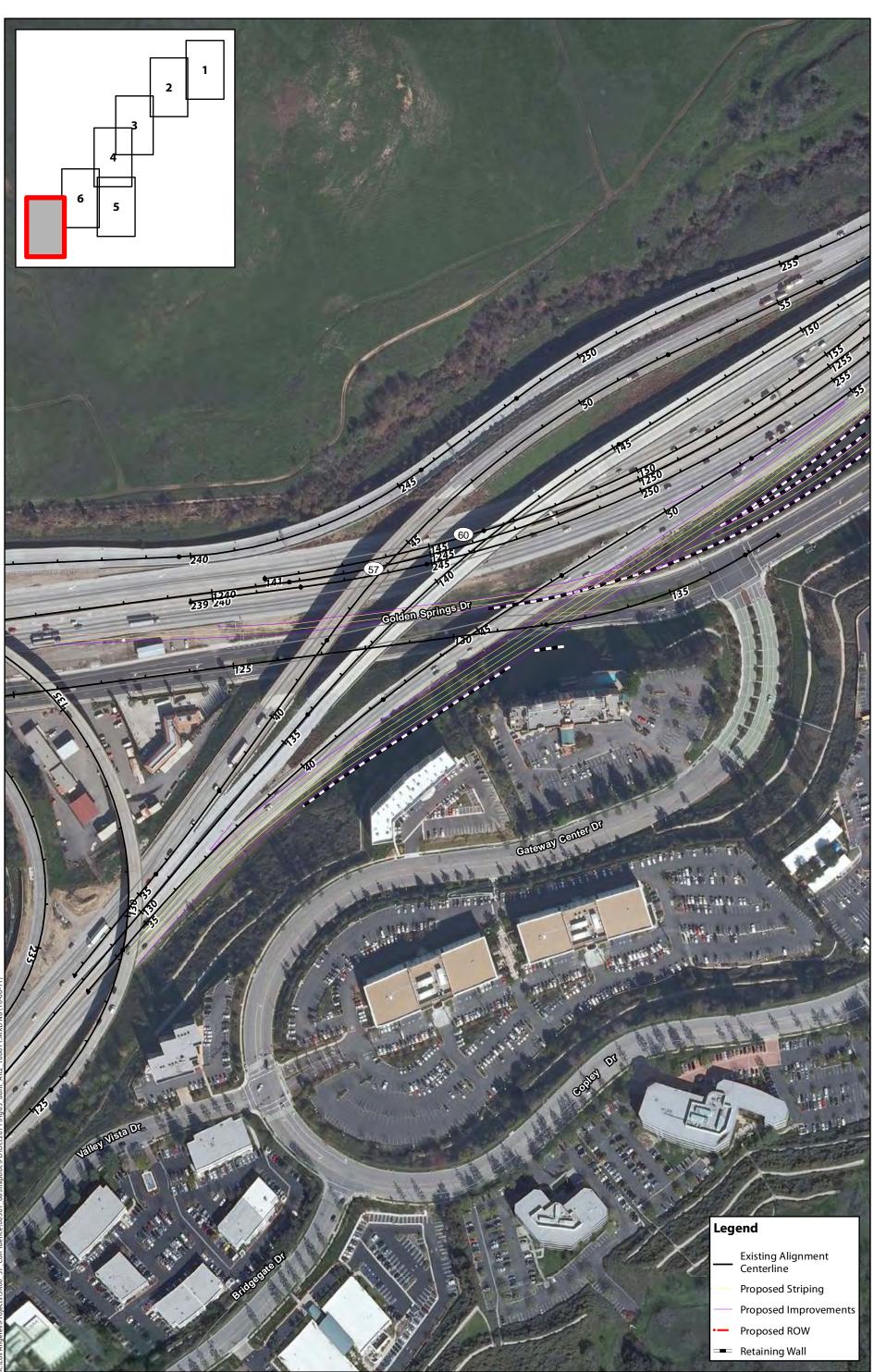
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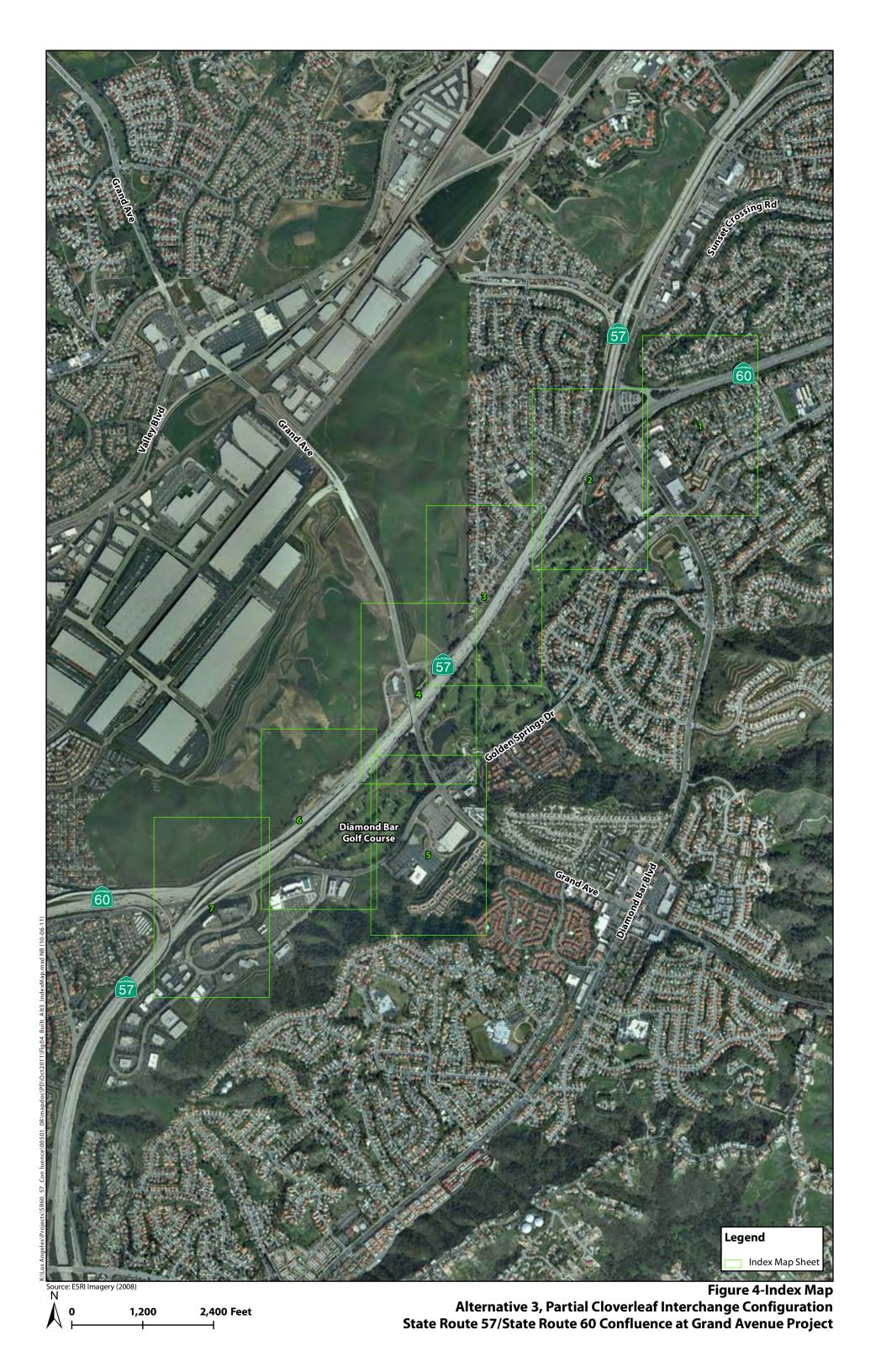
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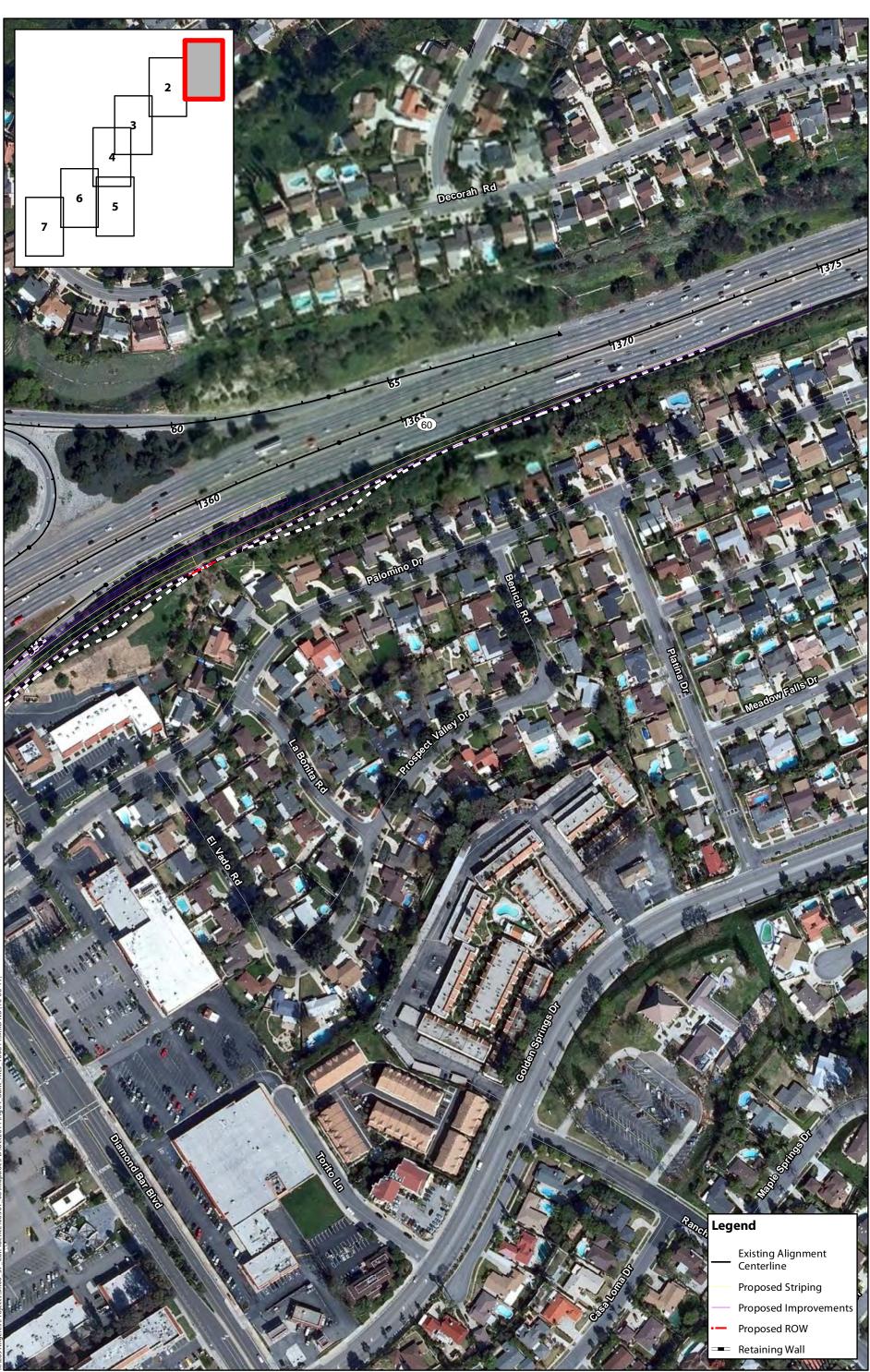




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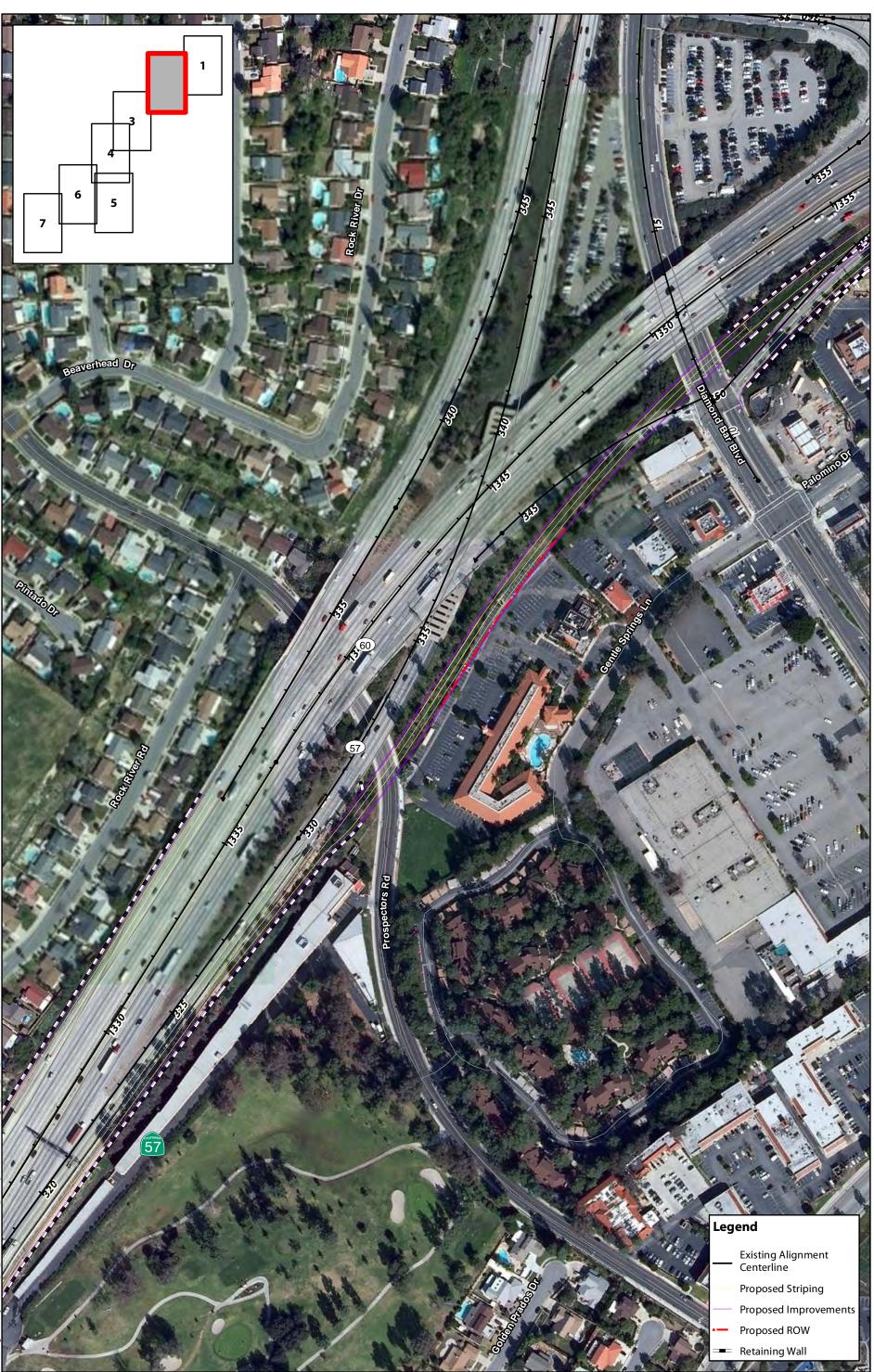




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Figure 4-Sheet 1 of 7

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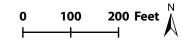
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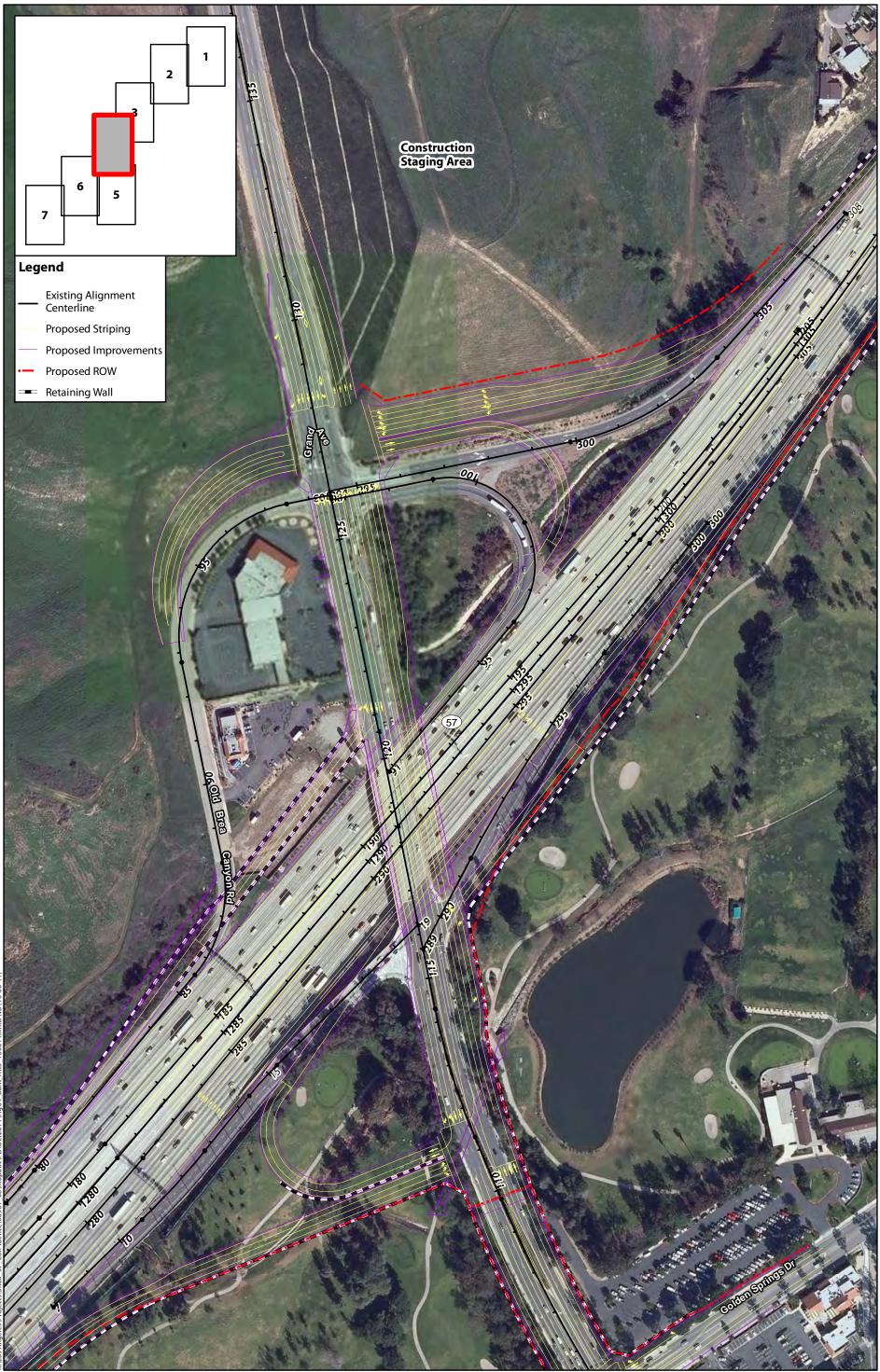
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Figure 4-Sheet 3 of 7



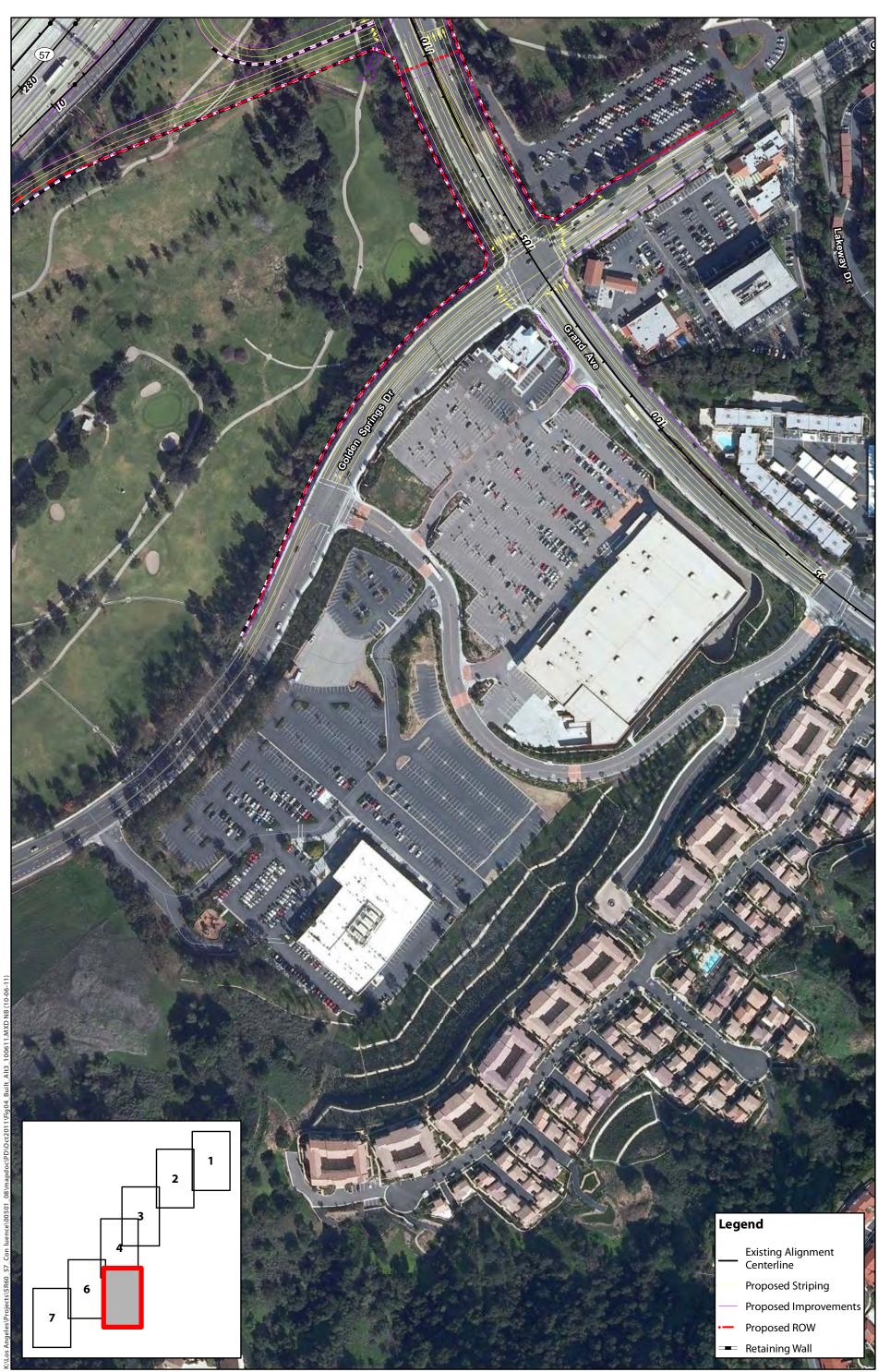


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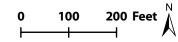
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Figure 4-Sheet 4 of 7 Alternative 3, Partial Cloverleaf Interchange Configuration State Route 57/State Route 60 Confluence at Grand Avenue Project



Source: ESRI Imagery (2008), WKE, Inc.(2011), ICF (2011)

Figure 4-Sheet 5 of 7



Alternative 3, Partial Cloverleaf Interchange Configuration State Route 57/State Route 60 Confluence at Grand Avenue Project

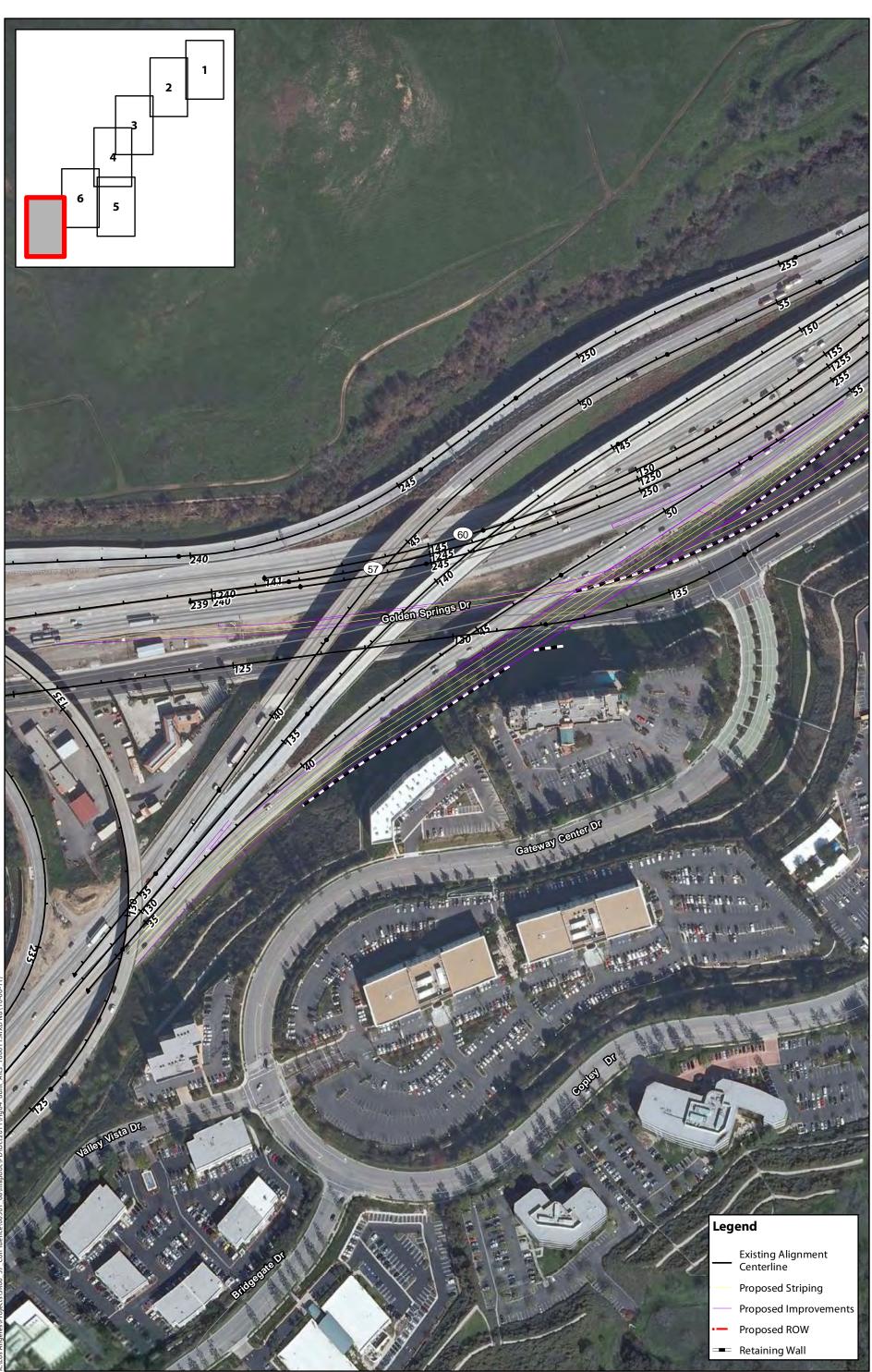


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Figure 4-Sheet 6 of 7

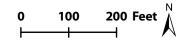
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Alternative 3, Partial Cloverleaf Interchange Configuration State Route 57/State Route 60 Confluence at Grand Avenue Project



Source: ESRI Imagery (2008), WKE, Inc.(2011), ICF (2011)

Figure 4-Sheet 7 of 7



Alternative 3, Partial Cloverleaf Interchange Configuration State Route 57/State Route 60 Confluence at Grand Avenue Project

The widening of Grand Avenue would continue south to Golden Springs Drive. Golden Springs Drive would be widened to allow additional through lanes, double left-turn lanes, and one right-turn lane on three legs of the intersection of Grand Avenue and Golden Springs Drive. One right-turn lane would be provided on Grand Avenue at the northbound approach to Golden Springs Drive. Street widening would occur on the north, east, and west legs of the intersection. Approximately 600 feet of northbound Grand Avenue south of the intersection at Golden Springs Drive would be restriped to three lanes.

A continuous pedestrian walkway is currently provided on the west side of Grand Avenue between Golden Springs Drive and Old Brea Canyon Road. However, on the east side of Grand Avenue, no pedestrian walkway is provided north of the overcrossing. Under both alternatives, 8-foot-wide walkways on both sides of Grand Avenue would be constructed from Golden Springs Drive to Old Brea Canyon Road. Neither build alternative would affect pedestrian walkways on other local roads.

The existing Grand Avenue overcrossing does not have sufficient length to accommodate an added northbound SR-57 through lane or sufficient vertical clearance over SR-60 to allow for widening. Therefore, it would be replaced. The replacement bridge would be longer and deeper, resulting in a raised profile along Grand Avenue.

2.2.2.1 Build Alternative 2: Combination Cloverleaf/Diamond Interchange Configuration Alternative

Alternative 2 would maintain the existing interchange configuration (compact diamond) for the eastbound SR-60 on- and off-ramps. The interchange configuration at Grand Avenue for Alternative 2 would remain a combination partial cloverleaf for the westbound SR-60 on- and off-ramps. An auxiliary lane would be added, connecting the new three-lane on-ramp at Grand Avenue to the new connector, which would bypass the north/east SR-57/SR-60 interchange.

As discussed in the common design features section below, the existing Grand Avenue overcrossing does not have sufficient length to accommodate an added northbound SR-57 through lane or sufficient vertical clearance over SR-60 to allow for widening. Therefore, it would be replaced. Under Alternative 2, the existing Grand Avenue overcrossing would be replaced by a 10-lane, 148-foot-wide structure over SR-60. The longer span would require a deeper structure, raising the Grand Avenue profile by about 4 feet. The bridge would contain eight through lanes and two 450-foot-long double left-turn lanes from southbound Grand Avenue to the eastbound on-ramp.

With implementation of Alternative 2, the new interchange configuration would require the eastbound on- and off-ramps to be relocated to the southeast by approximately 90 feet, which would require permanent acquisition of portions of the northern edge of the golf course both east and west of Grand Avenue. In addition, as part of Alternative 2, the Grand Avenue overcrossing would be replaced with a wider structure, and minor street improvements would be made along Golden Springs Drive, requiring further permanent acquisitions of golf course property along both the eastern and western edges of Grand Avenue as well as the northern edge of Golden Springs Drive. These acquisitions would result in 6.8 acres of golf course property being permanently incorporated into the proposed project. However, the facility would remain an 18-hole golf course,

with only minor changes made to the configuration, fairway distances, and par at holes 1, 2, 8, and 9. After implementation of Alternative 2, course par would be slightly less than what it is under existing conditions (i.e., 71 rather than 72). Total yardage would also be slightly less than it is under existing conditions (i.e., 6,660 yards rather than 6,801 yards).

In addition to the permanent acquisitions, temporary construction easements (TCEs) totaling approximately 2.8 acres would be required at the golf course to accommodate construction of the on- and off-ramps for the SR-57/SR-60 confluence, widen the Grand Avenue overcrossing, and make street improvements along the north side of Golden Springs Drive west of Grand Avenue. Construction work would last approximately 36 months, during which time vegetation clearing, excavation, and grading would take place on those portions of the golf course that would be permanently acquired or temporarily acquired under construction easements.

To accommodate construction activities and minimize any potential effects that construction may have on golf course users, a screened construction zone with restricted access would be established. If construction at the golf course were to occur in two phases, with only half of the course closed at any one time (nine holes), a total of 14 months would be required for construction (7 months to reconfigure nine holes [per phase]). If the entire golf course (all 18 holes) were to be reconfigured at the same time, the closure would last 9 months. Upon completion of construction, the required TCEs would be returned to the county, and the course would be restored to a condition that would be comparable to its existing condition. The facility would continue to serve as an 18-hole golf course but with some changes to its configuration because of the permanent acquisitions required for the newly configured on-and off-ramps, the widened Grand Avenue overcrossing, and the street improvements along Golden Springs Drive.

2.2.2.2 Build Alternative 3: Partial Cloverleaf Interchange Configuration Alternative

The main difference between Alternative 2 and Alternative 3 is the configuration of the eastbound SR-60 interchange at Grand Avenue. Under Alternative 3, the existing eastbound on- and off-ramps at Grand Avenue, which form a compact diamond interchange, would be reconfigured to form a partial cloverleaf interchange. The new intersection at Grand Avenue and the new eastbound on- and off-ramps would be located approximately 500 feet south of the existing intersection (i.e., midway between the freeway and Golden Springs Drive). The new eastbound on-ramp from southbound Grand Avenue would be a loop on-ramp that would join SR-60 as a new eastbound auxiliary lane. The existing eastbound on-ramp would be realigned to accommodate the widened Grand Avenue and merge into the eastbound auxiliary lane created by the new loop on-ramp from southbound Grand Avenue to eastbound SR-60. The auxiliary lane would connect to the new connector that bypasses the north/east SR-57/SR-60 interchange.

As discussed above, the existing Grand Avenue overcrossing would be replaced by a new structure over SR-60. However, unlike Alternative 2, a double left-turn lane from southbound Grand Avenue to the eastbound on-ramp would not be required because vehicles traveling southbound on Grand Avenue would access northbound SR-57 and eastbound SR-60 by way of the new loop on-ramp on the west side of Grand Avenue. The new Grand Avenue overcrossing would be widened to accommodate eight through lanes and a center divider/median (a total

width of 136 feet). A longer span would be required to accommodate the third SR-57 through lane and the loop on-ramp auxiliary lane. The longer span would require a deeper structure, raising the Grand Avenue profile by about 4 feet.

With implementation of Alternative 3, the new loop on-ramp and off-ramp intersection would be constructed approximately 500 feet south of the existing intersection, which would require permanent acquisition of portions of the northern edge of the golf course both east and west of Grand Avenue. In addition, as part of Alternative 3, the Grand Avenue overcrossing would be replaced with a wider structure, and minor street improvements would be made along Golden Springs Drive, requiring further permanent acquisition of golf course property along both the eastern and western edges of Grand Avenue as well as the northern edge of Golden Springs Drive. These acquisitions would result in 10.1 acres of golf course property being permanently incorporated into the proposed project. However, as with Alternative 2, the facility would remain an 18-hole golf course, with only minor changes made to the configuration, fairway distances, and par at holes 1, 2, 3, 8, and 9. After implementation of Alternative 3, course par would be equal to the existing par of 72. Total yardage would be increased to 6,848 yards compared with 6,801 yards under current conditions.

In addition to the permanent acquisitions, TCEs totaling approximately 3.4 acres would be required at the golf course to accommodate construction of the on- and off-ramps for the SR-57/SR-60 confluence, widen the Grand Avenue overcrossing, and make street improvements along the north side of Golden Springs Drive west of Grand Avenue. Construction work would last approximately 36 months, during which time vegetation clearing, excavation, and grading would take place on those portions of the golf course that would be permanently acquired or temporarily acquired under construction easements.

To accommodate construction activities and minimize any potential effects that construction may have on golf course users, a screened construction zone with restricted access would be established. If construction at the golf course were to occur in two phases, with only half of the course closed at any one time (nine holes), a total of 14 months would be required for construction (7 months to reconfigure nine holes [per phase]). If the entire golf course (all 18 holes) were to be reconfigured at the same time, the closure would last 9 months. Upon completion of construction, the required TCEs would be returned to the county, and the course would be restored to a condition that would be comparable to its existing condition. The facility would continue to serve as an 18-hole golf course but with some changes to its configuration because of the permanent acquisitions required for the newly configured on- and off-ramps, the widened Grand Avenue overcrossing, and the street improvements along Golden Springs Drive.

2.2.3 Construction Activities and Staging

The construction scenarios would be similar for both Alternative 2 and Alternative 3. The construction phase of the proposed project is anticipated to begin in the fall of 2014 and end by the fall of 2017. The proposed project would involve clearing, excavation, grading, and other site preparation activities prior to structural work and paving. On-site construction staging would occur just north of the westbound SR-60/southbound SR-57 Grand Avenue on- and off-ramps. This area, which is east of Grand Avenue, is owned by the City of Industry.

The project would be constructed in stages to limit local road closures, ramp closures, and freeway closures. The Grand Avenue overpass would be constructed in two stages to maintain four lanes of traffic throughout construction. Grand Avenue may be closed over several weekends between stages and during removal of the existing bridge. Other overnight or weekend closures would affect the westbound off-ramp, Golden Springs Drive at the SR-57 connector, and the Diamond Bar Boulevard on- and off-ramps. Mainline SR-60 would be closed overnight for demolition of the Grand Avenue overpass and erection of falsework over the freeway. All freeway lanes would be open for weekday peak-hour traffic. Longer term ramp closures would be required for the westbound loop on-ramp and the westbound direct on-ramp as well as access from southbound Grand Avenue to the eastbound SR-60 on-ramp.

As noted above, resources subject to Section 4(f) consideration include publicly owned lands consisting of public park/recreational lands; public wildlife and waterfowl refuges of national, state, or local significance; or historic sites of national, state, or local significance, whether publicly or privately owned. There are no wildlife and waterfowl refuges in the project area, and there are no significant historic sites in the vicinity. However, Diamond Bar Golf Course, a publicly owned golf course, which is within the project area, is considered a Section 4(f) resource. For purposes of this Section 4(f) evaluation, only those public park/recreational resources within approximately 0.5 mile of the project site have been identified for additional analysis.

3.1 Historic and Archaeological Sites

A cultural resources survey provided the basis for the determination that there are no significant historic or archaeological sites within the area of potential effect (Archaeological Survey Report and Historic Properties Survey Report dated January 2010).

3.2 Public Parks and Recreational Lands

One public golf course, Diamond Bar Gold Course, has been identified as a Section 4(f) resource within 0.5 mile of the project site (see Table 1). A detailed description of the resource is provided in the discussion of effects on Section 4(f) properties.

Map #	Name	Size and Features	Location and Owner	
1	Diamond Bar Golf Course	Approximately 174 acres [*] (18 holes, par 72, 6,801 total yards)	Location: City of Diamond Bar Owner: County of Los Angeles Operated by: American Golf Corporation	
[*] Information from personal communication with Los Angeles County Department of Parks and Recreation employee (Camille) in the Planning Section. February 2010. Source: ICF International, 2010.				

Table 1. Section 4(f) Properties—Public Parks and Recreational Lands

3.2.1 Diamond Bar Golf Course – Description and Significance of Property

3.2.1.1 Type/Location/Size

Diamond Bar Golf Course is a publicly owned golf course located at 22751 Golden Springs Drive in the City of Diamond Bar. The golf course has an area of approximately 174 acres and is bounded by the SR-57/SR-60 confluence to the north and west, Golden Springs Drive to the south and east, and a residential neighborhood (along Golden Prados Drive) to the east. In addition, the golf course is intersected by Grand Avenue, which divides the property into western and eastern halves (see Figure 5). The golf course was constructed in 1964 by the County of Los Angeles and is currently managed by the American Golf Corporation under the direction of the county. Diamond Bar Golf Course is a full 18-hole facility, with amenities that include a restaurant and bar, a golf shop, chipping and putting greens, a driving range, and a clubhouse.

As is typical with golf courses, the fairways at Diamond Bar Golf Course are landscaped with grass, and tall trees line each hole as well as the boundaries of the course. In addition, a large man-made pond is located just east of Grand Avenue. A network of concrete pathways, accessible by foot or electric golf cart, connects the fairways and the various amenities throughout the course.

3.2.1.2 Access/Facilities/Usage

The parking lot at Diamond Bar Golf Course has 37 parking spaces (33 standard parking spaces and four spaces for the handicapped). The lot is located on the northeast corner of Golden Springs Drive and Grand Avenue (see Figure 5). Vehicular access to the parking lot is provided from both Grand Avenue and Golden Springs Drive. Four Foothill Transit lines (lines 482, 492, 853, and 854) serve the area surrounding the golf course, and stops are provided along Golden Springs Drive. In addition, Diamond Bar Golf Course rents banquet/special event rooms that can accommodate 60 to 250 persons. The course is open to the public seven days a week from dawn until dusk and from 5:00 a.m. until dusk on weekends. Course rates range from \$14.50 to \$28.00, depending on the number of holes being played and the day of the week. Cart and club rentals are also available.

In 2010/2011, 90,024 patrons used the golf course (Badel pers. comm.).

3.2.1.3 Relationship to Similar Facilities in the Area

The golf course stands alone and is not part of a larger park or golf course.

3.2.1.4 Ownership/Jurisdiction

Diamond Bar Golf Course is owned by the Los Angeles County Department of Parks and Recreation.

3.2.1.5 Significance

Given the recreational needs of the community, as well as the relatively limited availability of public golf course resources in the region, Diamond Bar Golf Course is considered a significant Section 4(f) resource. Formal consultation with the county has confirmed that the resource in question plays an important role in meeting the recreational needs of the community and the county.



Figure 5. Existing Layout of Diamond Bar Golf Course

Chapter 4 Effects on Section 4(f) Resources

The following discussion describes how the project alternatives would affect the Section 4(f) resource. A summary of potential effects is provided in Table 2. Additional analysis pertaining to the Section 4(f) resource then follows.

An assessment has been made to determine if permanent or temporary occupation of a property would occur and if the proximity of the proposed project would disrupt access or cause noise, vibration, or aesthetic effects that would substantially impair the features or attributes that qualify the resource for protection under Section 4(f). The analysis of potential effects on the Section 4(f) resource includes the following:

- A description of the Section 4(f) resource;
- A discussion of how the proposed project alternatives would affect the Section 4(f) resource and whether the effects would result in use of the resource;
- An evaluation of any feasible and prudent alternatives to avoid use of the Section 4(f) resource. An alternative is not feasible if it cannot be built as a matter of sound engineering practice. A feasible alternative is not prudent if there are truly unusual factors present in a particular case, if there are uniquely difficult problems, or if the cost or community disruption resulting from the alternative reaches an extraordinary magnitude. A feasible alternative that fails to satisfy the purpose of and need for the project is usually also not prudent; and
- A discussion of measures to minimize harm to the Section 4(f) resource where a potential use has been identified. When a Section 4(f) resource must be used, efforts to minimize harm, including development of mitigation measures, must be undertaken in coordination with the agency that owns and/or administers the resource.

4.1 Effects under Build Alternative 2

During construction, 4.1 acres of the golf course would be used for staging. Furthermore, 7.3 acres of the golf course would be permanently incorporated into the proposed project. Property would be acquired along the northern edge of the golf course and along both the eastern and western edges with Grand Avenue as well as the northern edge of Golden Springs Drive. Generally, these acquisitions would result in the removal of trees lining the edge of the course, and would affect some of the paved pathways running through the north side of the course, and the along the east side of Grand Avenue. Hole 2 would be greatly affected by Alternative 2 as portions of the fairway, paved paths, trees, and fencing along the northern edge of the course would also be permanently incorporated under this alternative. Otherwise, the permanent acquisitions proposed under Alternative 2 would not substantially reduce the usability of the other holes on the course. Typical construction-period effects would include phased closure of parts of the golf course (e.g., some holes may not be available for play). During site preparation, tree/vegetation removal and material stockpiling would occur. Golf course parking would not be removed, but there

may be lane closures on Grand Avenue, resulting in diminished access. Once construction starts, noise would be generated by equipment, and fugitive dust would be present in areas close to construction.

During operation, all 18 holes of the golf course will be available for play. A sound wall along eastbound SR-60 would reduce noise levels, and enhancements to the clubhouse and snack bar would result in facilities that are better than existing. All screening vegetation and trees removed during construction would be replanted. Please see Section 5.5 for additional enhancements and measures to minimize harm.

4.2 Effects under Build Alternative 3

During construction, 3.7 acres of the golf course would be used for staging. Furthermore, 10.1 acres of the golf course would be permanently incorporated into the proposed project. Similar to Alternative 2, property would be acquired along the northern edge of the golf course and along both the eastern and western edges of Grand Avenue as well as the northern edge of Golden Springs Drive. The proposed cloverleaf ramp on the west side of Grand Avenue would require acquisition of a large corner of the course including the entirety of the Hole 8 green and associated paved pathways and rough along the northern edge of the course. However, Alternative 3 would require less property from the Hole 2 area of the course, east of Grand Avenue. Typical construction-period effects would include phased closure of parts of the golf course (e.g., some holes may not be available for play). During site preparation, tree/vegetation removal and material stockpiling would occur. Golf course parking would not be removed, but there may be lane closures on Grand Avenue, resulting in diminished access. Once construction starts, noise would be generated by equipment, and fugitive dust would be present in areas close to construction.

During operation, all 18 holes of the golf course will be available for play. A sound wall along eastbound SR-60 would reduce noise levels, and enhancements to the clubhouse and snack bar would result in facilities that are better than existing. All screening vegetation and trees removed during construction would be replanted. Please see Section 5.5 for additional enhancements and measures to minimize harm.

Please see Table 2 for a comparison of potential effects under the two build alternatives.

Resource	Build Alternative 2: Combination Cloverleaf/Diamond Interchange Configuration Alternative	Build Alternative 3: Partial Cloverleaf Interchange Configuration Alternative Use under Section 4(f)?	
	Use under Section 4(f)?		
Diamond Bar Golf Course (park and recreational resource)	 YES Acquisition of 7.3 acres of the 174-acre golf course, which would remove several holes from play if not reconfigured Requires reconfiguration of holes 1, 2, 8, and 9. Construction of new retaining walls along the freeway mainline Construction of protective fence and noise wall TCEs on 3.99 acres Phased closure of parts of the golf course during construction Limited holes available for play during construction Partial removal of earth berm, existing trees, and screening Disruption of existing cart path Diminished local area access because of lane closures on Grand Avenue during construction Other nuisance impacts related to increased dust, the presence of construction vehicles, etc. 	 YES Acquisition of 10.1 acres of the 174-acre golf course, which would remove several holes from play if not reconfigured Requires reconfiguration of holes 1, 2, 3, 4, 5, and 9. Construction of new earth berms and retaining walls along the freeway mainline, ramps, and Grand Avenue Construction of protective fence and noise wall Relocation of the golf course tunnel TCEs on 4.42 acres Phased closure of parts of the golf course during construction Limited holes available for play during construction Partial removal of earth berm, existing trees, and screening Disruption of existing cart path Diminished local area access because of lane closures on Grand Avenue during construction Other nuisance impacts related to increased dust, the presence of construction vehicles, etc. 	

 Table 2. Potential Effects on Section 4(f) Resources

Source: WKE and ICF International, 2012.

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Chapter 5 Applicability of Programmatic Section 4(f) Evaluation for Projects with Net Benefit

5.1 Alternative 1: No-Build Alternative

The No-Build Alternative would not change the physical environment in the project area, with the exception of changes from other projects and programs that are already planned for development in the area. Thus, there would be no Section 4(f) direct use under the No-Build Alternative.

5.2 Build Alternatives

Under both build alternatives, land from Diamond Bar Golf Course would be permanently incorporated into the proposed project. The project proponent will compensate the Los Angeles County Department of Parks and Recreation for any parkland used by providing lands of reasonably equivalent usefulness and location and at least comparable value or make a payment in lieu of providing such land. Also, the improvements and enhancements proposed for the golf course would lead to improved playability. As documented below, Build Alternative 2 and Build Alternative 3 meet the applicability criteria and required findings for programmatic Section 4(f) evaluation for projects with net benefit.

5.2.1 Build Alternative 2: Combination Cloverleaf/Diamond Interchange Configuration Alternative

With implementation of Build Alternative 2, the new interchange configuration would relocate the eastbound on- and off-ramps to the southeast, which would require permanent acquisition of portions of the northern edge of the golf course both east and west of Grand Avenue. In addition, as part of Build Alternative 2, the Grand Avenue overcrossing would be replaced with a wider structure, and minor street improvements would be made along Golden Springs Drive, requiring further permanent acquisition of golf course property along both the eastern and western edges of Grand Avenue as well as the northern edge of Golden Springs Drive. These acquisitions would result in 7.3 acres of the golf course property being permanently incorporated into the proposed project, a direct use under Section 4(f). However, once construction is complete, the project would not adversely affect recreational activities, features, and attributes or interfere with the recreational purpose of Diamond Bar Golf Course. The facility would remain an 18-hole golf course, with only minor changes made to the configuration, fairway distances, and par at holes 1, 2, 8, and 9 (Figure 6). After implementation of Alternative 2, course par would be slightly less than it is under existing conditions (i.e., 71 rather than 72). Total yardage would also be slightly less than it is under existing conditions (i.e., 6,660 yards rather than 6,801 yards). However, several enhancements are planned for the golf course, such as renovation of the tee and green complexes, construction of a practice pitching green, replacement of the concrete drainage swales with new subdrain systems, construction of a new noise attenuation wall along the freeway, and a new protective fence along perimeter roadways. Please see Section 5.5 for additional enhancements and measures to minimize harm.

In addition to permanent acquisitions from the golf course property, TCEs totaling approximately 4 acres would be required at the golf course to accommodate construction access to build the new on- and off-ramps for the SR-57/SR-60 confluence, widen Grand Avenue, and make street improvements along the north side of Golden Springs Drive, near the intersection at Grand Avenue. Construction work would last approximately 36 months, during which time vegetation clearing, excavation, and grading would take place on those portions of the golf course that would be permanently acquired or temporarily acquired under construction easements.

To accommodate construction activities and minimize any potential effects that construction may have on golf course users, a screened construction zone with restricted access would be established. If construction at the golf course were to occur in two phases, with only half of the course (nine holes) closed at any one time, a total of approximately16 months would be required for construction (8 months to reconfigure holes 1, 2, 8 and 9 and renovate all other green complexes and fairways). If golf course construction/renovation were to occur in a single phase, the closure would last approximately 12 months. Upon completion of construction, the required TCEs would be returned to the county, and the course would be restored to a condition that would be comparable to its existing condition. The facility would continue to serve as an 18-hole golf course but with some changes to its configuration because of the permanent acquisitions required for the newly configured on- and off-ramps, the widened Grand Avenue overcrossing, and the street improvements along Golden Springs Drive (Figure 6). However, because of the proposed renovation of the golf course, these changes would not diminish the user experience at the golf course. Although construction at the Grand Avenue overcrossing would result in minor temporary changes with respect to vehicular access (i.e., temporary lane closures or detours), the overcrossing would be constructed on an alignment that would be essentially identical to the existing condition; therefore, both access and parking would be unchanged upon completion of construction.

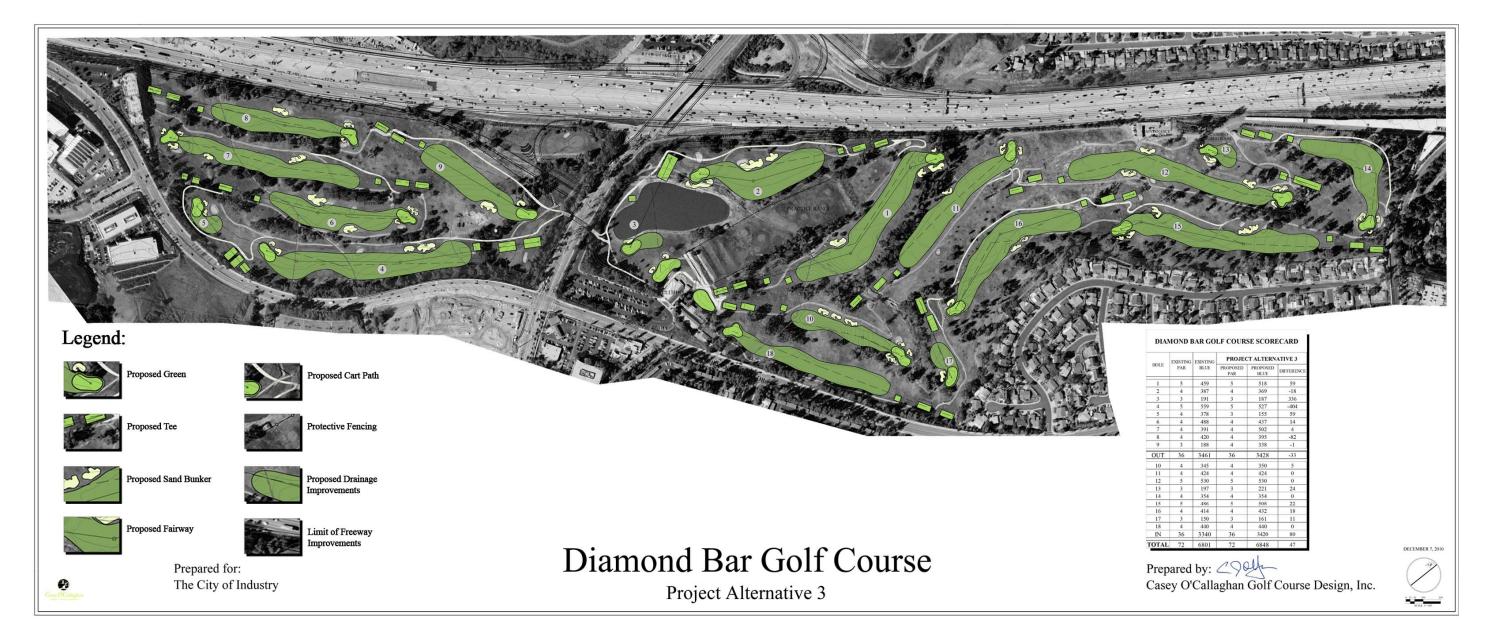
5.2.2 Build Alternative 3: Partial Cloverleaf Interchange Configuration Alternative

The partial cloverleaf interchange configuration alternative would require permanent acquisition of portions of the golf course property along the SR-57/SR-60 confluence, both east and west of Grand Avenue, as well as property at the Grand Avenue overcrossing and on the north side of Golden Springs Drive. The total area of golf course property to be permanently incorporated into the proposed project would be approximately 10.1 acres, a direct use under Section 4(f). However, as with Build Alternative 2, the partial cloverleaf interchange configuration alternative would not adversely affect recreational activities, features, and attributes or interfere with the recreational purpose of the Diamond Bar Golf Course. The facility would remain an 18-hole golf course, with changes made to the configuration, fairway distances, and par at holes 1,2, 3, 4, 5, and 9 (Figure 7); renovations would occur at the other holes. After implementation of Alternative 3, course par would be equal to the existing par of 72. Total yardage would be increased to 6,848 yards compared with 6,801 yards under current conditions. Therefore, with respect to par, Alternative 3 would equal existing conditions; with respect to yardage, it would be increased compared with existing conditions. Improvements include renovations to 13 additional holes, tees, fairways, and green complexes; construction of a new practice pitching green; replacement of the concrete drainage swales with new subdrain systems; construction of new noise attenuation walls along the freeway; and a new protective fence along perimeter roadways. Please see Section 5.5 for additional enhancements and measures to minimize harm.

Figure 6. Diamond Bar Golf Course Reconfiguration, Build Alternative 2



Figure 7. Diamond Bar Golf Course Reconfiguration, Build Alternative 3



In addition to permanent acquisitions from the golf course property, TCEs totaling approximately 4.4 acres would be required at the golf course to accommodate construction of the on- and off-ramps for the SR-57/SR-60 confluence, widen Grand Avenue, and make street improvements along the north side of Golden Springs Drive, west of Grand Avenue. Construction work would last approximately 36 months, during which time vegetation clearing, excavation, and grading would take place on those portions of the golf course that would be permanently acquired or temporarily acquired under construction easements.

To accommodate construction activities and minimize any potential effects that construction may have on golf course users, a screened construction zone with restricted access would be established. If construction at the golf course were to occur in two phases, with only half of the course (nine holes) closed at any one time, a total of approximately 16 months would be required for construction (8 months to reconfigure holes 1, 2, 3, 4, 5 and 9). If the golf course construction/renovation were to occur in single phase, the closure would last approximately 10 months. Upon completion of construction, the required TCEs would be returned to the county, and the course would be restored to a condition that would be comparable to its existing condition. The facility would continue to serve as an 18-hole golf course but with some changes to its configuration because of the permanent acquisitions required for the newly configured on- and offramps, the widened Grand Avenue overcrossing, and the street improvements along Golden Springs Drive (Figure 7). However, these changes would not diminish the user experience at the golf course. Although construction at the Grand Avenue overcrossing would result in minor temporary changes with respect to vehicular access (i.e., temporary lane closures or detours), the overcrossing would be constructed on an alignment that would be essentially identical to the existing condition; therefore, both access and parking would be unchanged upon completion of construction.

5.3 Applicability of Nationwide Programmatic Section 4(f)

For the reasons listed below, the proposed project's minor use of a protected Section 4(f) property satisfies the applicability criteria of FHWA's Section 4(f) Evaluation and Approval for Transportation Projects That Have a Net Benefit to a Section 4(f) Property.

Criterion 1: The proposed transportation project uses a Section 4(f) park, recreation area, wildlife or waterfowl refuge, or historic site.

Response: Build Alternatives 2 and 3 would require use of Diamond Bar Golf Course, a Section 4(f) resource.

Criterion 2: The proposed project includes all appropriate measures to minimize harm and subsequent mitigation necessary to preserve and enhance those features and values of the property that originally qualified the property for Section 4(f) protection.

Response: The California Department of Transportation (Caltrans) has been in consultation with the county to ensure that the proposed project does not permanently impair use of the golf course and that all the features and attributes that qualify the golf course as a recreational resource are enhanced to the extent possible. Because portions of the course would be incorporated into the project, measures to minimize harm to the property have been developed in consultation with the County of Los Angeles (agency with jurisdiction). These

measures are described in detail under section 5.5 and summarized as follows: reconfiguring the golf course to provide a functional 18-hole user experience (1); a noise wall on the eastern half of the course (2); reconstruction of cart paths (3); reconstruction of the practice putting green (4); conversion of the hole #9 green to a practice pitching green (5); relocating the practice range to provide a safer distance between the range and hole #2 (6); replacement of the concrete channel surface drains with covered drainpipes (7); additional protective netting and trees (8); compensation to the county in the form of replacement parkland (9); compensation to the golf course operator for loss of revenue (10); restoration of the property after construction (i.e., replanting of trees) (11); public notification of golf course closure during construction (12); and general BMPs for construction impacts (13). Measures 1 through 7 are intended to minimize the harm to features of the course such as the 18-hole configuration and 72 par. Because of recontouring on some of the fairways, the playability of the golf course is expected to improve. Also, enhancements to the clubhouse would ensure that the overall aesthetic appearance of the golf course would be improved. A golf course consultant is working with the owner of the golf course, the County of Los Angeles, to ensure that all functionalities of the golf course are maintained or enhanced. Additionally, measures to minimize harm to the property from construction activities, and through financial compensation to the owners and operators for loss of play during closure of the golf course are also provided. Please see Section 5.5 for a list of measures to minimize harm and enhance the features that qualify the property for Section 4(f) protection (see Appendix B for a letter from Caltrans regarding the proposed minimization and enhancement measures and the county's concurrence that the project would not result in any adverse environmental impacts that would permanently impair use of the publicly owned golf course).

Furthermore, Caltrans has prepared technical studies pertaining to air quality, noise, hydrology and water quality, biological resources, and community and visual impacts. The studies have not identified any substantial adverse impacts on golf course users. All feasible avoidance, minimization, and mitigation measures have been proposed to ensure that impacts on the environment will not be substantial.

Criterion 3: For historic properties, the project does not require the major alteration of the characteristics that qualify the property for the National Register of Historic Places (NRHP) such that the property would no longer retain sufficient integrity to be considered eligible for listing. For archeological properties, the project does not require the disturbance or removal of the archaeological resources that have been determined important for preservation in place rather than for the information that can be obtained through data recovery. The determination of a major alteration or the importance to preserve in place will be based on consultation consistent with 36 CFR part 800.

Response: Not applicable. The Section 4(f) property is not a historic resource.

Criterion 4: For historic properties, consistent with 36 CFR part 800, there must be agreement reached amongst the SHPO and/or Tribal Historic Preservation Officer (THPO), as appropriate; FHWA; and the applicant on measures to minimize harm when there is a use of Section 4(f) property. Such measures must be incorporated into the project.

Response: Not applicable. The Section 4(f) property is not a historic resource.

Criterion 5: The official(s) with jurisdiction over the Section 4(f) property agree in writing with the assessment of the impacts, the proposed measures to minimize harm, and the mitigation necessary to preserve, rehabilitate, and enhance those features and values of the Section 4(f) property and that such measures will result in a net benefit to the Section 4(f) property.

Response: Under both build alternatives, the existing 18-hole golf course would be reconfigured (reconfiguration would be limited to a few holes under both alternatives) so that it would continue to function as an 18-hole golf course, and the user experience would not be diminished but improved. Impacts to the course and the proposed measures to minimize harm of those impacts have been coordinated with the officials with jurisdiction, namely the Los Angeles County Department of Parks and Recreation. Several meetings have been conducted with county staff to inform them of the project and its potential impacts. Appendix B provides a letter from Caltrans regarding the proposed minimization and enhancement measures and the county's concurrence that the project would not result in any adverse environmental impacts that would impair use of the publicly owned golf course.

Criterion 6: The administrator determines that the project facts match those set forth in the applicability, alternatives, findings, mitigation and measures to minimize harm, coordination, and public involvement sections of this programmatic evaluation.

Response: Pending. Should this project move forward, a final programmatic evaluation would be approved by Caltrans, acting as FHWA, pursuant to the MOUs under SAFETEA-LU Sections 6004 and 6005, and continued under Section 1313 of Moving Ahead for Progress in the 21st Century (MAP-21) (P.L. 112-141), which was signed by President Obama on July 6, 2012.

5.4 Avoidance Alternatives and Other Findings

Pursuant to the requirements of the programmatic Section 4(f) evaluation, the following allinclusive list of alternatives would avoid any use of the protected Section 4(f) resource described above: (1) do nothing, (2) improve the highway facility without using the adjacent Section 4(f) resources, or (3) build an improved facility on a new location without using the Section 4(f) resources. Given the findings below, none of these alternatives would be feasible and prudent alternatives to the proposed project and the associated use of protected Section 4(f) land.

5.4.1 Do-Nothing Alternative

The programmatic Section 4(f) evaluation states that the Do-Nothing Alternative (also referred to as the No-Project Alternative) would not be feasible and prudent if the following findings are documented: "(*a*) it would not correct existing or projected capacity deficiencies or (*b*) it would not correct existing safety hazards or (*c*) it would not correct existing deteriorated conditions and maintenance problems and (*d*) not providing such correction would constitute a cost or community impact of extraordinary magnitude or result in truly unusual or unique problems when compared with the proposed use of the Section 4(f) lands."

A Do-Nothing, or No-Build, Alternative would not be feasible and prudent because it would not correct existing deficient traffic conditions in the project area. Not providing such correction would constitute a community impact of extraordinary magnitude when compared with the proposed minor use of Section 4(f) lands because traffic conditions would continue to deteriorate along SR-60 and at the existing Grand Avenue on- and off-ramps. In addition, portions of the project area have been identified as having higher than average rates of traffic accidents, including rates of fatal accidents. These existing safety concerns at the interchange would not be addressed by the Do-Nothing or No-Build alternative which may have unforeseen consequences including increased traffic accidents as traffic deficiencies continue to worsen. As the purpose and need statement for the proposed project indicates, the proposed project would 1) relieve congestion and delays on Grand Avenue from Golden Springs Drive to the interchange at SR-60, 2) relieve congestion and delays at the Grand Avenue interchange, 3) relieve congestion and delays on the freeway mainline, and 4) improve safety. The No-Build Alternative would not accomplish any of these project purposes. Furthermore, failure to act could only be expected to contribute to additional traffic congestion in the area.

The No-Build Alternative would not result in an impact on the Section 4(f) property; however, it does not meet the purpose and need for the proposed project.

5.4.2 Improvement without Using Adjacent Section 4(f) Lands

The programmatic Section 4(f) evaluation states that "[i]t is not feasible and prudent to avoid Section 4(f) lands by roadway design or transportation system management techniques (including, but not limited to, minor alignment shifts, changes in geometric design standards, use of retaining walls and/or other structures, and traffic diversions or other traffic management measures) if the following findings are documented: implementation of such measures would result in (a) substantial adverse community impacts on adjacent homes, businesses, or other improved properties or (b) substantially increased roadway or structure costs or (c) unique engineering, traffic, maintenance, or safety problems or (d) substantial adverse social, economic, or environmental impacts or (e) the project not meeting identified transportation needs and (f) the impacts, costs, or problems would be truly unusual or unique or of extraordinary magnitude when compared with the proposed use of Section 4(f) lands."

It is not feasible and prudent to avoid Section 4(f) lands by roadway design or transportation system management techniques. Modifications in the roadway design would most likely result in substantial adverse impacts on adjacent properties, including residences along Palomino Drive and Rock River Drive in the City of Diamond Bar. Commercial establishments such as the Best Western Diamond Bar Hotel and Ayres Suites Diamond Bar may be more severely affected, potentially resulting in relocation of these businesses. These impacts would be of extraordinary magnitude when compared with the proposed project's minor use and overall enhancement of Section 4(f) lands.

Several scenarios were considered during development of project alternatives for the project study report. Previously considered alternatives that would result in greater acquisitions of Section 4(f) lands were not carried forward to the environmental assessment/environmental impact report (EIR/EA). However, given the adjacency of the golf course to the Grand Avenue

interchange, any construction at the interchange would result in an acquisition of golf course property. Therefore, design features to minimize use of Section 4(f) lands have been included in the build alternatives.

5.4.3 Alternatives on New Location

The programmatic Section 4(f) evaluation states that "[i]t is not feasible and prudent to avoid Section 4(f) lands by constructing on a new alignment if the following findings are documented: (a) the new location would not solve existing transportation safety or maintenance problems or (b) the new location would result in substantial adverse social, economic, or environmental impacts (including such impacts as extensive severing of productive farmlands, displacement of a substantial number of families or businesses, serious disruption of established travel patterns, substantial damage to wetlands or other sensitive natural areas, or greater impacts on other Section 4(f) lands) or (c) the new location would substantially increase costs or engineering difficulties (such as an inability to achieve minimum design standards or to meet the requirements of various permitting agencies such as those involved with navigation, pollution, and the environment) and (d) such problems, impacts, costs, or difficulties would be truly unusual or unique or of extraordinary magnitude when compared with the proposed use of Section 4(f) lands."

It is not feasible and prudent to avoid Section 4(f) lands by constructing on a new alignment. Construction at another location would result in the proposed project failing to meet a primary objective, which is to improve the Grand Avenue interchange. Constructing an interchange at a new location would result in greater impacts on the community due to takes of residential and nonresidential property. Accordingly, the difficulties that would arise from constructing on a new alignment can reasonably be considered to be of extraordinary magnitude compared with the very minor use of property from the Section 4(f) resource.

5.5 Measures to Minimize Harm to the Section 4(f) Property

The following measures to minimize harm have been developed in consultation with the County of Los Angeles. In its letter of March 5, 2012, the County of Los Angeles concurred that these measures would minimize harm and enhance the golf course. All feasible and practicable measures to minimize harm will be proposed to reduce impacts on the Section 4(f) property. These will include the items outlined below.

- 1. Reconfigure the golf course so that it continues to function as an 18-hole golf course and the user experience is not diminished. The reconfiguration will occur in consultation with the agency having jurisdiction over the resource (Los Angeles County Department of Parks and Recreation). Some of the features that will be reconfigured are as follows:
 - o All 18 tee complexes shall be renovated or reconstructed;
 - All 18 green complexes, including greenside sand bunkers, shall be renovated or reconstructed; and

- All fairway sand bunkers shall be renovated or reconstructed.*
- The existing concrete gutters across the fairways shall be replaced with underground pipes, and a complete subdrain system shall be placed at all tees, bunkers, and greens.*
- 2. A noise wall will be constructed on the eastern half of the golf course (along the perimeter) as per the results of the project noise study report.
- 3. The wall-to-wall cart path system shall be maintained. However, there are areas where the existing cart path must be demolished and removed and a new cart path installed because of relocated holes.
- 4. The practice putting green shall be reconstructed.*
- 5. The existing hole #9 green complex shall be converted to a practice pitching green with sand bunkers.
- 6. The practice range tee shall be located approximately 50 feet farther to the south to create a safer relationship between the practice range and hole #2.*
- 7. The concrete channel surface drains that bisect various holes throughout the golf course shall be replaced with a drainpipe and covered with soil and grass.
- 8. Protective netting and trees shall be installed as required for safety and playability at the golf course.
- 9. The project proponent shall compensate the Los Angeles County Department of Parks and Recreation for any parkland used by providing lands of reasonably equivalent usefulness and location and at least comparable value or make a payment in lieu of providing such land.
- 10. The project proponent shall compensate the golf course operator for any loss of revenue during construction of the proposed project. The compensation will be based on recommendations of the Caltrans right-of-way agent.
- 11. Contract specifications for construction contractors shall require the construction area to be returned to a condition that is as good as the present condition or better upon completion of construction activities. This will include replanting any screening vegetation or trees removed during construction.
- 12. The public shall be notified about closure of the golf course through on-site notices and postings on the county's web site.
- 13. All feasible best management practices shall be implemented to reduce construction-period impacts in accordance with Caltrans policy.

The measures listed above are in addition to the avoidance, minimization, and mitigation measures proposed in the draft EIR/EA technical analysis.

*These measures, which were developed in consultation with the Los Angeles County Department of Parks and Recreation, would increase the total length of golf course reconstruction.

5.5.1 Other Enhancements

Other enhancements to the golf course to address any potential aesthetic impacts could include minor architectural improvements on the exterior of the clubhouse and snack bar.

5.6 Coordination

Caltrans has held several coordination meetings with the City of Industry and the Los Angeles County Department of Parks and Recreation. A list of meetings conducted so far with local elected officials and public agency staff members is provided below.

- **December 9, 2009:** Meeting with County Supervisor Don Knabe and County of Los Angeles Parks and Recreation staff to review the project alternatives and their impact on the community.
- January 26, 2010: Meeting with representatives from the Los Angeles County Department of Parks and Recreation and the cities of Diamond Bar and Industry to present the reconfiguration options for the golf course.
- April 27, 2010: Meeting with representatives from the Los Angeles County Department of Parks and Recreation to discuss the reconfiguration options in detail, with feedback received at the January 26, 2010, meeting.
- October 13, 2010: Meeting with Supervisor Knabe and staff to discuss the reconfiguration design's progress.
- June 8, 2011: Meeting with representatives from the Los Angeles County Department of Parks and Recreation to discuss the county's March 15, 2011, letter regarding golf course improvements.
- March 1, 2012: Meeting with representatives from the Los Angeles County Department of Parks and Recreation to discuss the December 19, 2011, Caltrans letter regarding golf course enhancements.

At these meetings, various design schemes for reconfiguration of the golf course were presented to county representatives, after which their input was sought. The measures to minimize harm presented in this report take into account feedback received from the county. Coordination letters between the city and the county are provided in Appendix B.

5.7 Section 6(f)(3) Considerations

Section 6(f)(3) of the Land and Water Conservation Fund Act (16 USC Sections 4601–4604) contains provisions to protect federal investments in park and recreational resources as well as the quality of those assisted resources. The law recognizes the likelihood that changes in land use or development may make park use in some areas purchased with Land and Water Conservation Fund assistance obsolete over time, particularly in rapidly changing urban areas, and provides for conversion to other uses pursuant to certain specific conditions:

Section 6(f)(3) – No property acquired or developed with assistance under this section shall, without the approval of the Secretary, be converted to other than public outdoor recreation uses. The Secretary shall approve such conversion only if he finds it to be in accord with the then existing comprehensive statewide outdoor recreation plan and only upon such conditions as he deems necessary to ensure the substitution of other recreation properties of at least equal fair market value and of reasonably equivalent usefulness and location.

This requirement applies to all parks and other sites that have been the subject of Land and Water Conservation Fund grants of any type and includes acquisition of parkland and development or rehabilitation of park facilities.

A review of the grants database found no record of Land and Water Conservation Fund assistance for property acquisition or development in the project area.¹

¹ National Park Service. 2010. *Land and Water Conservation Fund*. Available: http://waso-lwcf.ncrc.nps.gov/public/index.cfm. Accessed: January 25, 2012.

Chapter 6 References and Personnel Communication

Federal Highway Administration. 1987. FHWA Technical Advisory T 6640.8A.

Federal Highway Administration. 2005a. Section 4(f) Evaluation and Approval for Transportation Projects That Have a Net Benefit to a Section 4(f) Property.

Federal Highway Administration. 2012. FHWA Section 4(f) Policy Paper.

- ICF International. 2010a. Archaeological Survey Report for the State Route 57/State Route 60 Confluence Project. January.
- ICF International. 2010b. *Historic Properties Survey Report for the State Route 57/ State Route 60 Confluence Project.* January.
- National Park Service. 2012. Land and Water Conservation Fund. Available: http://waso-lwcf.ncrc.nps.gov/public/index.cfm Accessed: January 25, 2012.

Personnel Communication

Badel, Jorge A. County of Los Angeles Department of Parks and Recreation, Contracts, Golf & Special Districts Division. April 16, 2012—email Casey J. O'Callaghan, president, Casey O'Callaghan Golf Course Design, Inc.

Appendix A List of Preparers

Shilpa Trisal, AICP Project Manager

M.A., Community Planning, University of Cincinnati; B.A., Planning, School of Planning and Architecture, New Delhi, India.

Ms. Trisal has 8 years of experience in the environmental planning field, with a focus on Section 4(f) assessments, community impact assessments, framework plan/master plan formulation, visual analysis, and socio-demographic research and writing.

Lee Lisecki Project Director, QA/QC

Masters, Transportation Planning, Cornell University Graduate School of Engineering; B. Sc., Civil Engineering, Brown University.

Mr. Lisecki has 28 years of experience in preparing and managing CEQA and NEPA environmental documents, including initial studies/environmental assessments, negative declarations/FONSIs, and EIRs/EISs for development projects, specific and master plans, highway projects, and transit projects for state and local agencies.

Appendix B Section 4(f) Consultation

Exhibit	From	Subject
Appendix B-1	Joan A. Rupert, Section Head, Environmental and Regulatory Permitting, Los Angeles County Department of Parks and Recreation	Letter in response to notice of preparation of draft EIR/EA for the SR-57/SR-60 Confluence at Grand Avenue Project (dated September 17, 2009)
Appendix B-2	Wei Koo, Project Design Manager	Letter to Supervisor Don Knabe requesting project scoping meeting regarding Diamond Bar Golf Course (dated December 15, 2009)
Appendix B-3	Meeting Minutes	Project scoping meeting for Diamond Bar Golf Course (dated January 26, 2010)
Appendix B-4	Meeting Minutes	Project meeting for SR-60 Westbound On-Ramp at Grand Avenue Project (EA 255100) and SR-57/SR-60 Confluence Project (EA 279100) (dated April 30, 2010)
Appendix B-5	Jorge A. Badel, Senior Golf Director, Los Angeles County Department of Parks and Recreation	Letter regarding SR-57/SR-60 confluence improvements at Diamond Bar Golf Course (DBGC Impact – Remedial Requirements) (dated June 24, 2010)
Appendix B-6	John D. Ballas, City Engineer, City of Industry	Letter to Supervisor Don Knabe requesting concurrence regarding the minimization measures and enhancements for Diamond Bar Golf Course proposed as part of the SR-57/SR- 60 Confluence Project (dated January 25, 2011)
Appendix B-7	Don Knabe, Supervisor, Fourth District, Board of Supervisors, County of Los Angeles	Letter to the City of Industry and Caltrans requesting clarification regarding items listed in the January 25, 2011, letter concerning the enhancements for Diamond Bar Golf Course proposed as part of the SR-57/SR-60 Confluence Project (dated March 15, 2011)
Appendix B-8	Ron Kosinski, Caltrans District 7	Letter to Supervisor Don Knabe addressing the concerns raised in the March 15, 2011, letter regarding the enhancements for Diamond Bar Golf Course proposed as part of the SR-57/SR-60 Confluence Project (dated December 19, 2011)
Appendix B-9	Don Knabe, Supervisor, Fourth District, Board of Supervisors, County of Los Angeles	Letter to the City of Industry and Caltrans concurring with the measures to minimize harm and enhancements proposed in the December 19, 2011 letter (dated March 5, 2012).



COUNTY OF LOS ANGELES DEPARTMENT OF PARKS AND RECREATION "Creating Community Through People, Parks and Programs"

Russ Guiney, Director

September 17, 2009

Sent via email: <u>Ronald_Kosinski@dot.ca.gov</u> <u>Gary_Iverson@dot.ca.gov</u>

Mr. Ronald Kosinski Deputy District Director Division of Environmental Planning Caltrans District 7 100 Main Street Los Angeles, CA 9001

Dear Mr. Kosinski:

NOTICE OF PREPARATION OF A DRAFT ENVIRONMENTAL IMPACT REPORT (DEIR) FOR THE SR-57/60 CONFLUENCE AT GRAND AVENUE PROJECT / ENVIRONMENTAL ASSESSMENT (EA)

The Notice of Preparation of a Draft Environmental Impact Report (DEIR) for the SR-57/60 Confluence at Grand Avenue Project / Environmental Assessment (EA) (Project) has been reviewed for potential impact on the Department's facilities. The Project Study Report (PSR) – Preliminary Environmental Analysis Report (PEAR) has also been reviewed. The project will impact Diamond Bar County Golf Course (Golf Course) and the following comments are submitted accordingly.

GENERAL

The County is a Responsible Agency under the California Environmental Quality Act (CEQA) because of the potential use of the Golf Course (County parkland) to accomplish the project. Additionally, as a park, the Golf Course is afforded protection under the State Park Preservation Act which must be complied with to the satisfaction of the County. A Section 4(f) Evaluation should also be conducted in light of the Project's potential to have a significant adverse impact on the Golf Course and because it "is the policy of the United States Government that special effort should be made to preserve . . . public park and recreation lands . . ." (1966 Department of Transportation Act, codified in Federal law at 49 U.S.C. Section 303)

For the National Environmental Policy Act (NEPA), an Environmental Impact Statement (EIS) should be written rather than an Environmental Assessment (EA) since each of the alternatives in the PSR, with the exception of the "No Project" Alternative, would have a significant adverse impact on the golf course thus rendering the potential "Finding of No Significant Impact" (FONSI) required for an EA invalid.

Mr. Ronald Kosinski September 17, 2009 Page 2

AIR QUALITY

The proposed project will contribute to existing air quality problems in a region where the levels of ozone, carbon monoxide and particulate matter already exceeds federal limits established to protect public health. Increased traffic and congestion generated by Project construction will generate fugitive dust, mobile emissions, and various stationary source emissions. Certain Golf Course patrons are especially vulnerable to the effects of air pollutants and are considered "sensitive receptors" under CEQA. These patrons include the elderly, children and persons with pre-existing respiratory or cardiovascular illness. Impacts to these individuals would be significant. Mitigation measures that reduce the level of air quality impacts on Golf Course patrons should be incorporated into the project.

BIOLOGICAL RESOURCES

There are potential significant impacts to the Blue Line Stream that runs through the Golf Course and terminates at the proposed Grand Avenue off-ramp. There is also potential significant impact associated with loss of riparian habitat as well as impact to raptors with the loss of tall, mature trees. Mitigation measures should include, but not be limited to, the replacement of trees at a 3:1 ratio with a minimum size of 24 inch box.

LAND USE

If any part of the Golf Course is needed for the Project, there would be an inherent conflict in land use in that the augmented proximity of the freeway would be incompatible with an acceptable level of service delivery required for the operation of the Golf Course.

NOISE

The Project will introduce significant noise impacts to an already elevated level of ambient noise on the Golf Course where the ability to concentrate is essential to a positive recreation experience. Again, Golf Course patrons such as the elderly and children are considered sensitive receptors. Mitigation measures should include, but not be limited to, the construction of sound walls to reduce the level of noise on the Golf Course.

PUBLIC SERVICES/RECREATION

The proposed project will result in the Golf Course being located closer to the 57/60 freeway. The loss of Golf Course acreage could result in the use of manufactured slopes at 2:1 or 1:1 ratios. Moreover, the use of earth retaining wall structures and protective fencing at heights normally not used in County golf course designs could result in a negative golf experience not normally experienced on other County golf courses. The loss of Golf Course acreage will also have a significant impact on the overall operation of the course as well.

There are two areas of the Golf Course since it is currently bisected by Grand Avenue. There are six holes west of Grand Avenue and 12 holes east of Grand Avenue. The Mr. Ronald Kosinski September 17, 2009 Page 3

realignment or modification of any hole in either the west or east areas will have a ripple effect on the layout of the rest of the holes due to the need for re-establishing adequate safety setbacks and other design modifications for the protection of the golfers. Though these two areas can function independently, the Golf Course must still function as a whole and the redesign of the rest of the Golf Course or a portion thereof may be required.

Additionally, due to the potential loss of playable acreage at the golf course, the design of the course could be substantially altered such that the total length of the golf course would be shortened. This would have a negative impact on the quality of the course which could result in a reduction in the number of rounds of play and revenue. Mitigation measures should include, but not be limited to, redesign of a part or the entire Golf Course and related facilities.

TRAFFIC

The intersection of Grand Ave and Golden Springs Drive is close to the only ingress and egress for the Golf Course. The Project could have a significant impact on the ability of patrons attempting to enter the Golf Course parking lot. The Project could also result in reduced parking for the Golf Course patrons, including patrons of the Golf Course banquet facilities due to the widening of Golden Springs Drive and its encroachment onto the Golf Course parking lot. The widening of Golden Springs Drive will also have a significant impact as there is an extremely limited area to replace any lost parking spaces. Mitigation measures should include redesign and reconstruction of this area so that the existing number of parking spaces is maintained.

ECONOMIC EFFECT OF THE PROJECT

The Golf Course is operated under a lease agreement between the County and a concessionaire both of whom have a vested financial interest in a quality recreational facility that attracts golfers and others who may be interested in renting the banquet facilities for private functions. The operation of this facility is a considerable source of revenue to the County and the loss of any revenue would be directly attributable to the physical changes in the environment resulting from the project.

DEPARTMENT OF PUBLIC WORKS (DPW)

Los Angeles County Public Works has noted that the proposed interchange improvements are located in a potentially liquefiable area per the State of California Seismic Hazard Zones Map – San Dimas and Yorba Linda Quadrangles. Geotechnical reports addressing mitigation measures for any geotechnical hazards should be included as part of the EIR. Public Works further notes that the proposed improvements will be reviewed for traffic congestion mitigation, geometrics, and other concerns upon review of the draft EIR, traffic data, and growth projections used in the analysis.

The contact person for DPW is Phil Doudar and he can be reached at 626-458-5926 or by email at <u>pdoudar@dpw.lacounty.gov</u>.

Mr. Ronald Kosinski September 17, 2009 Page 4

PROJECT MAILING LIST

Please add the attached list of names to the project mailing list.

Thank you for including this Department in the review of this notice. Should you have any questions, please contact me at (213) 351-5126 or <u>jrupert@parks.lacounty.gov</u>. Please note that our offices and DPW's are closed on Fridays.

Sincerely,

han Kinged

Joan A. Rupert Section Head Environmental and Regulatory Permitting

JR/BM:tls/response to NOP

Attachment

 c: Fourth Supervisorial District (C. Pedersen, E. Stibal, D. Simmons) Department of Public Works (P. Doudar, D. Hunter, B. Winter, T. Duong) Parks and Recreation (J. Wicker, N. E. Garcia, L. Hensley, J. Badel, L. Lee, D. Mesa, B. Moscardini, M. Yamamoto)

Response to NOP.doc

ATTACHMENT

Please add the following people to the project mailing list:

Los Angeles County Board of Supervisors - Fourth Supervisorial District

Curt Pedersen, Chief of Staff Fourth Supervisorial District Kenneth Hahn Hall of Administration, Room 822 500 West Temple Street Los Angeles, 90012

Erin Stibal, Deputy Fourth Supervisorial District Bellflower Field Office 10025 East Flower Street Bellflower, CA 90706

Dick Simons, Deputy Fourth Supervisorial District Rowland Heights Field Office 1199 Fairway Drive, Suite 111 Walnut, CA 91789

County of Los Angeles - Department of Parks and Recreation

Russ Guiney, Director County Los Angeles, Department of Parks and Recreation 433 South Vermont Ave. Los Angeles, CA 90020

John Wicker, Chief Deputy Director County Los Angeles, Department of Parks and Recreation 433 South Vermont Ave. Los Angeles, CA 90020

Debbie Martin, Administrative Services Deputy Director County Los Angeles, Department of Parks and Recreation 433 South Vermont Ave. Los Angeles, CA 90020

Los Angeles County - Department of Public Works

Phil Doudar, Unincorporated Areas Liaison Los Angeles County Department of Public Works Programs Development Division 900 S. Fremont Avenue Alhambra CA 91802 DPW Contact - <u>pdoudar@dpw.lacounty.gov</u> Office 626-458-5926

Bill Winter, Assistant Deputy Director Los Angeles County Department of Public Works Programs Development Division 900 S. Fremont Avenue Alhambra CA 91802

Dennis Hunter, Assistant Deputy Director Los Angeles County Department of Public Works Land Development Division Programs Development Division 900 S. Fremont Avenue Alhambra CA 91802

Mr. Toan Duong Los Angeles County Department of Public Works Land Development Division CEQA Unit 900 S. Fremont Avenue Alhambra CA 91802

Names for project mailing list.doc

County of Los Angeles - Department of Parks and Recreation (continued)

Mika Yamamoto, Unincorporated Areas Liaison County Los Angeles, Department of Parks and Recreation 433 South Vermont Ave. Los Angeles, CA 90020

Kandy Hayes, Contracts-Chief County Los Angeles, Department of Parks and Recreation Contracts, Golf and Special Districts Division 301 N Baldwin Ave Arcadia, CA 91007

Jorge Badel, Head of Golf Operations County Los Angeles, Department of Parks and Recreation Contracts, Golf and Special Districts Division 301 N Baldwin Ave Arcadia, CA 91007

Larry Lee, Golf Director County Los Angeles, Department of Parks and Recreation Contracts, Golf and Special Districts Division 301 N Baldwin Ave Arcadia, CA 91007

David Mesa, Architect-Golf County Los Angeles, Department of Parks and Recreation Contracts, Golf and Special Districts Division 301 N Baldwin Ave Arcadia, CA 91007

Larry Hensley, Chief of Planning County Los Angeles, Department of Parks and Recreation 510 South Vermont Ave., Room 201 Los Angeles, CA 90020

Joan Rupert, Section Head-Environmental County Los Angeles, Department of Parks and Recreation 510 South Vermont Ave., Room 201 Los Angeles, CA 90020 <u>Parks and Recreation Contact</u>: jrupert@parks.lacounty.gov; 213-351-5126

Bryan Moscardini, Departmental Facility Planner I County Los Angeles, Department of Parks and Recreation 510 South Vermont Ave., Room 201 Los Angeles, CA 90020



December 15, 2009

Honorable Supervisor Don Knabe County Supervisor Fourth District 822 Kenneth Hahn Hall of Administration 500 West Temple Street Los Angeles, CA 90012

Attention: Erin D. Stibal- Fourth District Field Deputy

Subject: 57/60 Confluence Project at Grand Avenue Interchange Project Scoping Meeting on Diamond Bar Golf Course

Dear Supervisor Knabe:

The City of Industry appreciates being given the opportunity to present the 57/60 Freeway Confluence Project to you and your staff last week. As a follow up of that meeting, the city is requesting a scoping meeting with the County staff from the Parks and Recreation Department and others who oversee the Diamond Bar Golf Course. The City golf course consultant Casey O'Callaghan has prepared conceptual level design with features aimed at offsetting impact to the golf course from the proposed freeway ramp for Alternative 3A. The intent of the scoping meeting is to acquaint the county staff with the on-going preliminary freeway and golf course designs, and to explore a range of design features that could be incorporated in the current project to reduce impacts to the golf course. A preliminary agenda for this meeting is attached herein.

Please kindly provide me a few options on time and date convenient to you and other county staff. If possible, we would like to hold the meeting before mid January, 2010. We will be inviting other key project stakeholders to this meeting; namely the City of Diamond Bar and Caltrans. I will be responsible for coordinating with everyone outside the County to confirm for this meeting.

57/60 Confluence Project Meeting with County Staff

We look forward to our scoping meeting with the County, and receiving written comments from the County staff shortly following the meeting. We will work diligently with all our stakeholders to bring this vitally important transportation project to fruition.

Sincerely WKE, Inc.

Wei Koo, PE Project Design Manager 57/60 Confluence Project

Cc: Dickie Simmons/ Fourth Supervisorial District- Field Deputy Julie Moore/ Fourth Supervisorial District- Planning Deputy Jorge Badel / County of Los Angeles Phil Doudar/ LA County Department of Public Works Joan Rupert/ County of Los Angeles, Environmental Planning John Ballas/ City of Industry David Liu/ City of Diamond Bar Gary Iverson/ Caltrans Jiwanjit Palaha/ Caltrans Jatinder Gaur/ Caltrans Casey O'Callaghan Lee Lisecki / ICF



MEETING MINUTES

Project Scoping Meeting (DB Golf Course)

WKE JN: 08009-17 Caltrans EA: 279100

MEETING:	SR-57/SR-60 Confluence Improvement (EA 279100 Project Report/ Environmental Document Phase))
DATE:	January 26. 2010	
TIME:	10:00 am to 11: 30 am	FINAL
LOCATION:	Diamond Bar Golf Course Club House Banquet Room City of Diamond Bar, CA	

Date Prepared: 2/16/2010 Date Revised:

Attendees		Organization		Phone Number	<u>E-mail Address</u>
Agustin	Barajas	Environmental	СТ	(213)897-7665	agustin barajas@dot.ca.gov
Alissa	Cope	Sage Consulting		(949)243-2282	acope@sageenvironmentalgroup.com
Bryan	Moscardini	County Parks	CLA	(213)351-5133	bmoscardini@parks.lacounty.gov
Casey	O'Callaghan	Casey O'Callaghan Go	If Course Cons	(949)675-5650	casey@golfcoursedesign.net
David	Doyle	D. City Manager	CDB	(909)839-7012	david.doyle@ci.diamond-bar.ca.us
David	Liu	City Engineer	CDB	(909)839-7040	david.liu@ci.diamond-bar.ca.us
David	Mesa	County Parks	CLA	(626)821-4647	dmesa@co.la.ca.us
Dickie	Simmons	Board of Supervisor Of		(909)594-6561	Dsimmons@lacbos.org
Eduardo	Pereira	City Contract Manager	CNC	(626)333-0336x240	epereira@cc-eng.com
Erin	Stibal	Board of Supervisor Of	ICLA	(562)804-8208	Estibal@lacbos.org
Gary	Iverson	Environmental	СТ	(213)897-3818	gary_iverson@dot.ca.gov
Grace	Lee	City of DB	CDB	(909)839-7081	grace.lee@ci.diamond-bar.ca.us
Greg	Gubman	Planning	CDB	(909)839-7065	greg.gubman@ci.diamond-bar.ca.us
Hank	Nguyen	Project Engineer	WKE	(714)953-2665x111	hnguyen@wke-inc.com
Jim	DeStefano	City Manager	CDB	(909)839-7011	james.destegano@ci.diamond-bar.ca.us
Jiwanjit	Palaha	Project Manager	СТ	(213)897-6926	jiwanjit_palaha@dot.ca.gov
Joan	Rupert	Planning- County of LA	CLA	(213)351-5126	jrupert@parks.lacounty.gov
John	Ballas	City Engineer	COI	(626)333-2211	jdballas@cityofindustry.org
Jorge	Badel	County Parks	CLA	(626)821-4649	jbadel@parks.lacounty.gov
Larry	Hensley	Planning- County of LA	CLA	(213)351-5098	Ihensley@parks.lacounty.gov
Larry	Lee	County Parks	CLA	(626)821-4646	llee@parks.lacounty.gov
Lee	Lisecki	Environmental	ICF J&S	(213) 627-5376	<u>llisecki@icfi.com</u>
Mario	Anaya	Environmental	ICF J&S	(213)627-5376	<u>manaya@icfi.com</u>
Patrick	Campbell	County Parks	CLA	(213)351-1980	pcampbell@parks.lacounty.gov
Rick	Yee	Project Engineer	Diamond Bar	(909)839-7043	rick.yee@ci.diamond-bar.ca.us
Roger	Hernandez	Real Estate	CLA	(213)974-4208	rhernandez@ceo.lacounty.gov
Ryan	McLean	City of DB		(909)839-7016	ryan.mclean@ci.diamond-bar.ca.us
Shilpa	Trisal	Environmental	ICF J&S	(213)627-5376	strisal@icfi.com
Wei	Koo	Project Manager	WKE	(714)953-2665 x 110	wkoo@wke-inc.com

Distribution PDT Distribution List (Page 2)

The following items presented summarize the substantive items discussed or issues reviewed at the above meeting to the best of the writer's memory. The information presented herein is for specific direction from the Project Development Team. All attendees are requested to review these minutes and respond in writing within seven (7) calendar days from receipt. If no responses or comments are received, these minutes will be accepted as a final version.

SR-60 Westbound On Ramp at Grand Avenue (EA 255100) SR-57/SR-60 Confluence Project (EA 279100) Meeting Minutes

No.	Discussion	Reference	ject	Description	Status	Opened	Due Date	Complete	Action For
	Discussion Item No.	NO.	Sub						
			OR	Meeting with LA County on Golf Course Redesign 1/26/10			<u>.</u>		
1	P09A-1		GC	JD Ballas (City of Industry, herein referred to as "City") introduced the project and the goals for the meeting. City of Industry is working with City of Diamond Bar to build the 57/60 Confluence Project. This is a scoping meeting with the County of Los Angeles (CLA) who owns the Diamond Bar Golf Course (DBGC). The design team will present the impact to DBGC and solutions to mitigate those impacts. The meeting is to collect comments from CLA on golf course design by Casey O'Callaghan. City is also sensitive to the concern about possible impact on future revenues of DBGC due to the proposed improvements, and ask CLA to provide suggestions on other potential improvements that could be considered for DBGC in order to offset those impact to the golf course revenues.	info				
2	P09A-2		DES	W. Koo went over the project alternative 3A. The engineering team has made several design refinement from the previous version that was presented to CLA almost two years ago. The current design for Alt 3A reduces the take in the course from the previous design for Alt 3B. In addition, the engineering team is working with Caltrans to reduce the proposed bypass ramp from 2 lanes to a single lane ramp, which further reduces the impact to the golf course. There is no physical impact to the Ayres Suite Hotel adjacent to DBGC. But there will be a tall cutretaining walls next to the hotel. The emergency access on the north end of the hotel will remain with no impact. The Holiday Inn Express on Gateway Center Dr. will not be affected by the proposed ramp connector. The single-lane connector would avoid substantial impact to the golf course east of Grand Avenue, and will avoid impacting the row of private properties east of Diamond Bar Blvd. The traffic report by KOA resulted in changes in the lane striping at Golden Spring and Grand Avenue. The street widening would take up an existing landscape buffer between the street sidewalk and parking, but the parking will not be affected. W. Koo mentioned that some of the feature (such as a single lane connector) requires a design exception approval by Caltrans. Caltrans is currently reviewing the Fact Sheet.	info				
3	P09A-3		GC	Casey O'Callaghan presented the golf course reconfiguration for freeway alternative 3A of the SR-57/SR-60 Confluence project. The freeway widening will required the reconfiguration of the golf course including hole numbers 1, 2,3, 8 and 9. Since the reconfigured Tees and Greens will be built in areas not been used as part of the fairways, Casey believes all the reconfigurations would be built while golf course remains operational. There might be a need to build temporary green complexes at holes 1 and 2 while we build the permanent greens. All golf course construction would be done and tees and green complexes moved before setting up a construction fence for the freeway construction. Casey preliminary estimate for construction duration for the golf course improvements is six months.	info				
4	P09A-4		GC	C.O'Callaghan provided another option for 9th green which places it closer to the pond. This would reduce the elevation difference from the tee. This was done at the request of J. Badel. Jorge also suggests for Casey to look at moving the 1st tee back into the existing practice putting green area. This could increase the length of drive for hole 1 close to 500 yd, and bring the modified course to a 72 par. This would make up for the loss of yardage shown in Casey's design. C. O'Callaghan will look into these modifications for the golf course enhancements. J. Ballas indicated that City is OK with CLA working directly with C. O'Callaghan to bring these and possibly other enhancement ideas to Casey's design. It's the City's objective that CLA does not suffer financial loss with a precipitous drop in the number of golfers due to the proposed modifications to the golf course.	Open	1/26/10			C. O'Callaghan

SR-60 Westbound On Ramp at Grand Avenue (EA 255100) SR-57/SR-60 Confluence Project (EA 279100) Meeting Minutes

No.	Discussion Item No.	Reference No.	Subject	Description	Status	Opened	Due Date	Complete	Action For
5	P09A-5		GC	The existing cart-path tunnel under Grand Avenue will have to be relocated. Current proposal is to build a new tunnel that crosses Grand Avenue at a diagonal alignment about the location of the proposed eastbound on and off ramp. W. Koo mentioned the alignment does not comply to Caltrans Encroachment policy, and it would require an approval by Caltrans for a policy exception. An alternative alignment for the cart-path tunnel to the south is not desirable. Designers have communicated that to Caltrans already. D. Mesa asked if the proposed tunnel could risk having ball hitting the cart. Casey said there is some risk for cart hearing east out of the tunnel that could face #3 tee-off. Casey is proposing to erect a protective fence outside the cart path for a short length as it emerges from the tunnel going toward #3 Tee box.	Info				
6	P09A-6		ENV	G. Iverson mentioned that SR-57/SR-60 Confluence project environmental evaluation process will follow both CEQA and NEPA, and need to comply to Section 5400 and 5409 of the Public Resource Code, Section 4F, and Parkland Preservation Act. Caltrans is the oversight for CEQA, but a lead agency for NEPA documents. Part of the requirement of meeting Section 4F is to keep the existing function as a public golf course. Regarding possible sound walls along the golf course, G. Iverson indicated that golfers on golf course might not meet the NEPA definition for "sensitive receptor". W. Koo indicated that project will evaluate it as part of the noise analysis	info				
7	P09A-7		ROW	J. Ballas stated the City is fully aware of its obligation to meet the Public Parkland Preservation Act PPA). The City has retained OPC as their consultants in looking at various options to make up for the lost of estimated 9 acres of parkland (from DBGC). City offers to perform the search for possible replacement land for the 9 acre park. CLA will set the parameters of which the project could consider in searching for additional acreage to offset for the loss. L. Henseley will provide the parameters to the City. E. Stibal asked if CLA Park and Rec could perform the search for the replacement acreage that would meet the requirement of the PPA. J. Destefano asked if the replacement land needs to stay within the supervisorial district of Don Knabe (District 04). There appears to be a consensus among the attendees that the replacement park land should fall within the Supervisorial District 04 boundary.	Open	1/26/10			County Parks
8	P09A-8		ROW	D. Mesa asked about Temporary Construction Easement (TCE) requirement. W. Koo responded that it is anticipated that construction of the freeway widening would require TCE from the golf course. Specific TCE requirements in DBGC have not been established. It will be the design team's objective to keep the TCE to the minimum to lessen impacting the golf course.	info				
9	P09A-9		ENV	CLA would like to reduce or eliminate some of the concrete ribbon drains in the golf course. As part of the golf course improvements for Holes No. 2 and 9, the existing ribbon drain around the pond will be piped. CLA is asking if the ribbon drain inside the driving range and in # 1 fairway could be piped as well. A. Cope confirmed the ribbon drains are part of the jurisdiction water. If we eliminate them with pipes, it will have to be mitigated. A. Cope will discuss the possibility with the regulatory agencies (Fish & Games and possibly with Fish and Wildlife Service). J. Badel (County) added the following post meeting notes into the meeting records: J. Badel indicated that if the ribbon drains (part of the blue line stream) is to be kept in the golf course, the agreement needs to address the following: - Anticipated time delays in golf play - proposed playing are adjacent to the drain. - Proposed playing area adjacent to stream area - Additional maintenance cots - Golf course take line for 50 year rain storm - Consider naturalizing the bank and planting the creek.	Open	1/26/10			A. Cope

SR-60 Westbound On Ramp at Grand Avenue (EA 255100) SR-57/SR-60 Confluence Project (EA 279100) Meeting Minutes

No.	Discussion Ref	erence	ject	Description	Status	Opened	Due Date	Complete	Action For
	Discussion Ref Item No.	No.	Sub						
10	P09A-10		ROW	W. Koo distributed the acreage count inside the DBGC that would be displaced by the project. A total of 8.5 acres is estimated that includes the new eastbound off ramp, the relocation of the open trench drain along SR-60 to the west of the DBGC, the relocated eastbound slip ramp, and widening of Grand Avenue.	info				
11	P09A-11		ENV	 D. Mesa asked about the protective fencing. C. O'Callaghan stated the work has not been done. Casey will work with a subconsultant to perform the trajectory study for establishing the requirements for high protective fencing. It is likely that existing high fence would remain, or be replaced it is being displaced (such as the one next to the eastbound off-ramp to Grand Avenue). J. Badel (County) added the following post meeting notes into the meeting records: County Golf Operation requesting the following items be added as design considerations regarding the existing and new protective fencing layout and design: The protective fence consultant will prepare alternatives for the County review that would meet the County's goal for mitigating errant balls without compromising integrity of the course. It may be that one alternative needs further modification or that we need to combine different portions of alternatives to find the best solution Design to consider the option of building a new practice putting green in conjunction with the reconstruction of number 1 tee (add drive length). Level the practice putting green and install a retaining wall. Design to consider converting the existing number 9 green to a practice chipping green. New protective netting and large trees should be considered for safety. Design to consider moving the new number 2 green at the edge of the lake (which may require a new retaining wall) Trees should be replaced with matured trees wherever possible. The driving range, related to the new number 2 hole, needs to be thoroughly studied for safety for the golfers on the second hole. 	Open	1/26/10			C. O'Callaghan
12	P09A-12		ENV	G. Iverson reminded everyone that while it is appropriate to discuss the improvements as mitigations to reduce the impact to the golf course, and to ensure DBGC will remain functional, no dollar amount shall be discussed between the City and CLA over the golf course improvements, right-of-way and cost to acquire the additional land to replace the 9 acres of park land, etc.	info				
13	P09A-13		ENV	The main contact person for CLA on all DBGC issues is Jorge Badel (Jbadel@parks.lacounty.gov). The main contact person from the City's consultant is Wei Koo (wkoo@wke-inc.com)	info				
14	P09A-14		ENV	W. Koo asked participants to anticipate the meeting minutes in a few days, and to provide comments to the meeting minutes within 2 weeks after receiving the email. W. Koo also requested that additional comments that did not get brought up during the meeting can be written in the meeting minutes as "postcript" notes. They will be annotated in the final minutes as such.	Open	1/26/10	2/15/10		W. Koo All attendees

1/26/2010 57/60 CONFLUENCE GOLF COURSE MEETING NAME COMPANY PHONE E-MAKE 1 HANK NOUVER WRE (114) 9532665 HAGUYER WREINE 2 Rick Yee City of Diamond Bar 909)839-7043 rick yee bar.ca. US 3 Grace Lee City of Diamond Bar 909)839-7081 grace.lee @ ci. diamond-bar.cq.us . Coly 4 Joan Rupert Co. Parke 213-351-5126 jruperte parks. lacounty. gov 5 Larry Hensley LACO. PER 213-351-5098 Thensley @ parks, lacounty, gov is Roger Humander L.A Co. Real Estate (213)974-4208 rhernander Bleo lacanty.go. 7 BRITAN MOSCARDINI COUNTY PANIOS: REC 2133515133 BMOSCARDINI@parks la county.gov 8 PATRICK CAMPBELL 400 PAR 213351 1980 PCAMPBELL @ PARKS, LACOUNTY.601 9 Agustín Bargas Culturns 213.897-7665 agustin-banajas@dot.cg 10 Eduardo Pereira CNC Engg City of Industry 626-333-0336 epereira Occ-eng.com 11. John Ballas City of Industry 626 333-2211 joballas & City of inclustry, org 12. GARY INERSON CARTRANS (213) 897-3818 GART-INERSON@DOT.CA. 601 13. JIWANNIT PALAHA JP Caltures (213) 8976926 JPACAHA Oddt. G. Jou 14. DAVID MASA LACOPP. (626)821-9647 15 LARRY LEE LAC DE + Rel- 626 821-4646 16 Dickie Simmons Donknabés Office 5946561 DSIMMONSE LACEOS. 17 Joege Badel Ibadel@Ports. la comby. gov 18 Erin Stibal Supervisor Knabe's office (S62)804-8208 Estibulations. 19 Wei Fos UKE (714) 953-2665 X110 UKOOCUKE-int. 20. DAVID G. LM MATOND BAR 209-839-7040 Louid. Hu Com 21 GREG GUBMAN DIAMOND BOR 209.939 1005 GREG. GUBMAN US DIAMOND BOP 909.839.1065 CU. DIAMOND-BAR.CA. US ICF INTERNATIONAL 213-07-5376 State Dichi-com 21 GREG GUBMAN 22. SHILPA TRISAL CASEY D'CAMAGINAN COORSED O'CAMAGINAN GOLF 949675-5650 CASEY@ GOLFCOURSEDESIN. FR COURSE DESION, NO. 24 25 ALISSA COPE SAGE ENV. GROUP 949.243:2282 A coper SAGEEN VINNMENTAD Appoint DAVE Doyle 26 City of Diamon Bar 909-835-7012 david doylec. dicmond-hr City of Piamond Bar 909-839-7016 ryan melean . US Qui diamond bar : caus 27 Ryan Mclean City & DB 909-839-7011 james. destetaro & cidiamend-bar. cq. de 28 Jim Destetano

SR-60 Westbound On Ramp at Grand Avenue (EA 255100) SR-57/SR-60 Confluence Project (EA 279100) MEETING MINUTES

No.	Discussion Item No.	Reference No.	Subject	Description	Status	Opened	Due Date	Complete	Action For
				DIAMOND BAR GOLF COURSE MEETING 4-27-2010					
1	L12-1		GC	C.O'Callaghan went over the two golf course reconfiguration options that he has prepared. Both options were drawn on Project Alternative 3A footprint. Golf Course Option 3A-1 would maintain the basic configuration of the course and modify or reconstruct four fairways and five green complexes. Existing cart path tunnel under Grand will be replaced with a new tunnel running diagonally underneath Grand at the future eastbound on and off ramp intersection. Option 3A-2 would require reconfiguring 7 fairways and green complexes. Option 3A-2 would also include a new cart path tunnel perpendicular to Grand Avenue just south of the proposed EB on and off ramp intersection. Both options could be constructed without having to shut down part or the entire course. There will be temporary green complexes in place to allow the plays to continue. G. Iverson indicated that CT would prefer the option to stage construct the course and to maintain all 18 holes of play on this golf course through the golf course and freeway construction.	Info				
2	L12-2		GC	J.Badel indicated that County has received this information in a pre-meeting on the 21st. They are reviewing the two options. County is aware that the team is trying to zero in on a "preferred" option. The County Parks and Rec needs to check in with the Supervisor's office as well. Jorge indicated that will take at least 4 weeks of discussions and reviews. They will get back to the C. O'Callaghan on that when there is a decision.	Open	4/27/10	6/1/10		County
3	L12-3		GC	J. Badel stated in response to Caltrans that the County understands and indeed is supportive of the freeway and the interchange project. The County and City will work through the mitigation and golf course improvements to ultimately develop a plan that would keep the golf course in operation during and post construction of the freeway project to the satisfaction of the County.	Info				
4	L12-4	L09-9	GC	C. O'Callaghan indicated that he has developed a list of improvements in addition to the reconfiguring the fairways and green complexes. J. Badel indicated the County has that list from C. O'Callaghan, and will be reviewing the list when weighing on the golf course option. G. Iverson asked the County and City to work on finalizing that list . The improvements on the list could be considered directly related to the freeway and Grand Avenue construction, and other improvements that are necessary in order to maintain the golf course to a playable condition considering the lost of yardage, reduced driving range, areas lost, etc.	TDL	4/27/10			
5	L12-5		DES	W. Koo went over the staging concept of the Grand Avenue cart path tunnel reconstruction. The cart path tunnel will be constructed with the "cut-and-cover" method, and it would be constructed in two stage while maintaining all six lanes on Grand Avenue. In order to do so, Grand Avenue needs to be widened on both sides in either stages. Because of the tunnel construction, part of the confluence project would be constructed in an early construction stage which would fully construct Grand Avenue south of the proposed tunnel that includes the widening of Golden Spring Drive. W. Koo indicated the total construction time for the tunnel and street widening is estimated at 9 months. All the utility and drainage lines in the existing tunnel will be routed to the new tunnel. Caltrans requires that the existing tunnel be demolished and filled in afterward.	Info				
6	L12-6	L12-4	ENV	J. Rupert asked the designer to provide an estimated construction schedule for the golf course, Grand Avenue widening and the tunnel reconstruction. County needs the information to be able to fully assess construction impact to the golf course. W. Koo and C. O'Callaghan will develop the overall construction schedule.	TDL	4/27/10	5/5/10		W. Koo C.O'Callaghan

Status Legend: TDL: To do list Open: Action in bold texts Closed: Action satisfactorily responded Resolutin: Resolutions for closed action item Info: no action required

SR-60 Westbound On Ramp at Grand Avenue (EA 255100) SR-57/SR-60 Confluence Project (EA 279100) MEETING MINUTES

No.	Discussion Item No.	Reference No.	Subject	Description	Status	Opened	Due Date	Complete	Action For
7	L12-7	L09-7	GC	J. Ballas stated that City of Industry would like to know the County's preference for the 10 acre of replacement land in order for the Project to meet the requirements of the California Parkland Preservation Act (CPPA). The City has started the initial step in identifying possible sites and locations with land of similar values and zoning as the DBGC (been it is a low land and flood detention basin). City of DB has indicated that they might offer to sell 10 acres of an old school site in the City. (J. Badel requested for the location of that site, J.Ballas requests R. Yee (City of Diamond Bar) to supply that information). J. Rupert indicated that County is working on a memo which outlines the options for the project to meet CPPA. The memo is being reviewed by District 4 Supervisor's office. County will send the memo to the City of Industry when approved.	TDL	4/27/10			R. Yee J.Rupert
8	L12-8		ROW	L. Tong suggested that the ROW Datasheet shall assume the 10 (+/-) acres of the golf course will be acquired by Caltrans for the purpose of constructing the freeway improvements. The additional 10 acres that the City needs to secure to replace the 10 acres could be handled through an MOU between the County and the City. Caltrans needs not be involved with that process.	Info				
9	L12-9		ENV	G.Iverson said that Section 4(f) analysis could proceed with the two golf course options without prejudice. The 4(f) analysis will require a concurrence letter from the County, and suggest the City to work through the concurrence process with the County. Regarding the improvements been proposed by the project team, all the proposed improvements should be addressed in the environmental documents (EIR/EA). However, the 4(f) analysis (Federal document) should focus only on those work that are considered directly impacted by the freeway and Grand Avenue project. G.Iverson also suggests that a "commitment letter" be prepared as part of the EIR/EA documents that outlines all the improvements in the DBGC.	Info				
10	L12-10		ENV	W. Koo to send to ICF the golf course plan for Alternative 2 that C.O'Callaghan had previously prepared. The project team is now focusing only on Alt 3A as a technical superior alternative. Section 4(f) will include Alt 2 and discuss it's impact. Additional clarifications may be needed from C. O'Callaghan on Alt 2.	TDL	4/27/10	4/30/10		W. Koo



COUNTY OF LOS ANGELES

DEPARTMENT OF PARKS AND RECREATION

"Creating Community Through People, Parks and Programs"

Russ Guiney, Director

June 24, 2010

Mr. Wei Koo, SE WKW, INC 400 N. Tustin Avenue, Suite 295 Santa Ana, California 92705

Dear Mr. Koo:

SR-57/SR-60 CONFLUENCE IMPROVEMENTS DIAMOND BAR GOLF COURSE (DBGC) IMPACT – REMEDIAL REQUIREMENTS

In regards to the above reference freeway project, its encroachment and impact on the DBGC, the County of Los Angeles is requiring the following remedial action under Alternative 3A-2:

- Construct/reconstruct 18 tee complexes with sufficient area for what is traditionally referenced as back, middle, forward and family tees.
- Construct/reconstruct 18 green complexes, with bunkering.
- Retention of "wall to wall" cart path.
- Construct/reconstruct of fairway bunkers.
- Construct/reconstruct existing practice putting green, currently located immediately behind the 1st tee complex.
- Conversion the existing 9th green to a practice pitching green, with bunker.
- Reconstruct of existing driving range tee-line.
- "Burying" Blue Line stream.
- Construct sound wall (with landscaping) separating the DBGC from the 57/60 freeway interchange and its encroachment onto the course.
- Upgrades to exterior of existing clubhouse and snack bar facility.
- Protective screening and trees as required for safety and playability.

The above is a preliminary general scope and subject to adjustment by the County. Should you have any questions or comments, do not hesitate to contact me at (626) 821-4649.

Sincerely,

bourd. Budd

Jorge A. Badel Senior Golf Director

c: Erin Stibal, Parks Deputy, Fourth District Joan Rupert, Parks and Recreation File



CITY OF INDUSTRY

January 25, 2011

Honorable Supervisor Don Knabe County Supervisor Fourth District 822 Kenneth Hahn Hall of Administration 500 West Temple Street Los Angeles, CA 90012

Attention: Julie Moore- Transportation Deputy

Subject: SR-57/ SR-60 Confluence Project at Grand Avenue Interchange

Dear Supervisor Knabe:

The California Department of Transportation ("Caltrans") is proposing to reconfigure the 2.5mile confluence of SR-57 and SR-60 by adding auxiliary lanes and reconfiguring the on-and off-ramps at Grand Avenue. Caltrans is the lead agency for the Environmental Impact Report/Environmental Assessment (EIR/EA) under preparation for this project. The City of Industry is the project proponent. Due to the potential for permanent and temporary right-ofway takes from Diamond Bar Golf Course (considered a public recreational area), application of Section 4(f) of the Department of Transportation Act of 1996 at the federal level and Parks Preservation Act of 1974 at the state level are triggered.

The following general environmental effects to the Diamond Bar Golf Course property have been identified based on a preliminary assessment. Detailed impacts will be presented in the Draft EIR/EA that will be ready for circulation in summer 2011:

- Permanent right-of-way acquisition of less than 12 acres of land from the Golf Course, which would affect several holes from play [four (4) holes under Freeway Alternative 2, and seven (7) holes under Freeway Alternative 3]
- Temporary construction easement of less than 5 acres
- Construction of new retaining walls along the freeway mainline, Grand Avenue and Golden Springs Drive (mostly at top of the slopes)
- Relocation of a cart path tunnel under Grand Avenue
- Phased closure of portions of the golf course during construction
- Intermittent disruption of play during construction
- Removal of some earth berms, screening trees and high net fences
- Disruption of existing cart paths
- Local access interruption due to construction of Grand Avenue and Golden Springs Drive widening

Supervisor Don Knabe January 25, 2011 Page Two

• Other nuisance impacts related to increase in noise, dust, presence of construction vehicles, etc

As part of an ongoing effort to minimize adverse effects on the Diamond Bar Golf Course property, a plan for reconfiguration of the golf course has been prepared. In September, 2008, the City of Industry hired a golf course consultant, Casey O'Callaghan Golf Course Design, Inc., who had extensive experience working with the County on similar golf course projects. Since that time, Casey O'Callaghan Golf Course Design, Inc. has been working on various schemes for reconfiguration and looking at ways to minimize playability effects on the golf course, which included a design option where seven holes would be directly affected. During the preparation of this plan, Casey O'Callaghan Golf Course Design, Inc., the City and Caltrans have been in touch with the County and have taken their feedback into account. A letter from the County of Los Angeles Department of Parks and Recreation dated June 24, 2010 (attached herein) provided the basis for the redesign of the golf course improvement. Attached is the latest golf course plan dated December 7, 2010, which includes the following features or measures to minimize harm:

- All eighteen tee complexes will be reconstructed
- All eighteen green complexes, including greenside sand bunkers will be reconstructed
- All fairway sand bunkers will be reconstructed
- The wall to wall cart path system will be maintained. There are areas where the existing cart path must be demolished and removed and a new cart path installed because of golf hole location changes
- The practice putting green will be reconstructed
- The existing hole #9 green complex will be converted to a practice pitching green with sand bunkers
- The practice range tee will be located further to the south by approximately fifty feet to create a safer relationship between the practice range and hole #2. Hole #2 will be shifted further south
- The concrete channel surface drains that bi-sect the fairways throughout the golf course will be replaced with under-drain pipes and the original ground will be grassed
- Existing golf course features such as protective netting and trees displaced by the project will be replaced as required for the safety, aesthetics, and playability of the golf course

The proposed golf course modifications will allow the golf course to maintain a par 72. The modifications will allow the golf course to increase from 6,801 yards to 6,848 yards. Other enhancements to the golf course would also be undertaken to address aesthetic impacts, these are:

• Washing or repainting the exterior of the clubhouse facility and snack bar that may be affected by construction dust

Supervisor Don Knabe January 25, 2011 Page Three

Following the requirements of the California Public Park Preservation Act, the project will also be responsible for replacing and/or remediating the permanent loss of golf course land in order to construct the proposed freeway interchange project. The City of Industry, as the project proponent, will work with the County in identifying potential sites for substitution of lost park land, should it be necessary, in order to meet the requirements of the Park Preservation Act. The acquisition of park replacement land will be conducted as part of the right-of-way work, and it shall take place only should Project Approval be granted following the approval of the environmental documents.

In addition, all feasible BMPs and standard protocols would be followed during construction to reduce construction-period impacts in areas such as stormwater, water quality, air quality, and noise. Detailed analysis of construction period impacts and measures to avoid, minimize, and mitigate these impacts will be presented in the Draft EIR/EA, which will be made available to the County for review.

At this point of the environmental process, Caltrans seeks the County's concurrence on the attached plan dated December 7, 2010. This would allow Caltrans to move forward and analyze the impacts of this reconfiguration plan in its Draft EIR/EA.

By executing your signature below, you are not waiving any rights to comment on the Draft EIR/EA. Thank you for your cooperation in this matter and if you have any questions, please feel free to contact us at any time.

ncerelv. Kallas John D. Ballas

City Engineer

Attachments: Proposed Reconfiguration Plan for Freeway Alt 3 Copy of County Letter dated June 24, 2010

Cc: Jorge Badel / County Los Angeles Department of P&R Erin Stibal / County Supervisor Field Deputy Dickie Simmons/ County Supervisor Field Deputy David Liu/ City of Diamond Bar Wei Koo/ WKE

Concurrence by County of Los Angeles Department of Parks and Recreation

Name and Title

Date

JDB:WK:mk

APPENDIX B-7



BOARD OF SUPERVISORS COUNTY OF LOS ANGELES

822 KENNETH HAHN HALL OF ADMINISTRATION / LOS ANGELES, CALIFORNIA 90012 Telephone (213) 974-4444 / FAX (213) 626-6941

> DON KNABE SUPERVISOR, FOURTH DISTRICT

March 15, 2011

Mr. John D. Ballas City Engineer City of Industry 15625 East Stafford Street City of Industry, California 91744-0366

Dear Mr. Ballas:

We are in receipt of your letter dated January 25, 2011, regarding the SR-57/SR-60 Confluence Project at Grand Avenue Interchange and its impact on the Diamond Bar Golf Course (DBGC). Per the Department of Parks and Recreation's letter dated June 24, 2010, omissions and clarifications must be addressed:

Park Preservation Act

Your letter questioned the necessity of identifying potential sites for the substitution of lost park land. Please know that from the County's perspective, it is without question, that it will be necessary to replace the loss of any and all parkland resulting from the proposed project.

Sound Wall

The expansion of the freeway and its encroachment onto the DBGC will negatively impact the golfing experience as freeway traffic will now be situated even closer to the golfing public. Installation of a sound wall separating the DBGC from the 57/60 freeway and its encroachment onto the golf course is required to mitigate the increased noise impact associated with the construction and operation of the project.

Clubhouse and Snack Bar

Improvements to the exterior of the existing clubhouse and snack bar facility will also be required in order to provide balance between the redesigned golf course and the now outdated clubhouse exterior.

Blueline Stream

As a point of clarification, please note that undergrounding the blue line stream will require that Caltrans direct all surface water from the golf course (either irrigation water or nuisance water) to existing Caltrans easements. All drainage for tees, greens and bunkers will be directed by subgrade piping to existing Caltrans easements. The existing golf course soil condition does not allow for normal percolation; therefore, collecting water in a drywell is not acceptable. 가 가지 않는 것이 있었다. 이상 가지 않는 것이 있는 것이 있는 것이 있는 것이 있다. 이상 가지 않는 것이 있는 것이 있는 것이 있다. 가지 않는 것이 있는 것이 있는 것이 있는 것이 있다. 같은 사이에 있는 것이 있다. 것이 있는 것이 있는 것이 있는 것이 있는 것이 있는 것이 있는 것이 있 같은 사이에 있는 것이 같은 것이 있는 것이 있다.

Mr. John D. Ballas March 15, 2011 Page 2

Golf Course Plan

In concept, we agree that the golf course plan dated December 7, 2010, designed by Casey O'Callaghan could be used as one of the alternatives to the proposed project. At this point, with respect to the playability and operation of the golf course, this design appears to meet the needs of the public and the concessionaire, but will be watched closely for any changes.

Fiscal Impact

The proposed golf course renovation will cause a decline or possible elimination of revenue for the County and its private concessionaire during the construction phase of the project. It is required that the County and or its concessionaire be compensated in full, for all lost revenues, during the construction phase and for any period thereafter required for play to return to its preconstruction levels.

I look forward to continuing this highly collaborative process with you.

Sinderely,

DON KNABE

Supervisor, Fourth District County of Los Angeles

DK:co

Enclosures

 c: Mr. David Liu, City of Diamond Bar Mr. Wei Koo, SE, WKE Mr. Jorge Badel, Department of Parks and Recreation Ms. Joan Rupert, Department of Parks and Recreation Mr. Rick Velasquez, Chief of Staff Ms. Julie Moore, Deputy Mr. Dickie Simmons, Deputy Ms. Erin Stibal

APPENDIX B-8

EDMUND G. BROWN Jr., Governor

DEPARTMENT OF TRANSPORTATION DISTRICT 7 DIVISION OF ENVIRONMENTAL PLANNING 100 MAIN STREET, SUITE 100 LOS ANGELES, CA 90012-3606 FAX (213) 897-2593 TTY (213) 897-4937



Flex your power! Be energy efficient!

RECEIVE

BY:

DEC 2 3 2011

December 19, 2011

Honorable Supervisor Don Knabe County Supervisor Fourth District 822 Kenneth Hahn Hall of Administration 500 West Temple Street Los Angeles, CA 90012

Attention: Julie Moore, Transportation Deputy

Subject: SR-57/SR-60 Confluence Project at Grand Avenue Interchange

Dear Supervisor Knabe:

This letter is a follow up to your letter to the City of Industry dated March 15, 2011 regarding the few remaining issues on the Diamond Bar Golf Course (DBGC) that required clarifications. City of Industry and City of Diamond Bar, in cooperation with the State Department of Transportation (Caltrans) remain steadfast in developing the SR-57/SR-60 Freeway Confluence Project and continuing to pursue approvals through the CEQA and NEPA process. We appreciate the cooperative and engaging staff input we have been receiving from the County throughout the project development process.

As result of the meeting between the City of Industry and the County of Los Angeles Department of Parks and Recreation on June 8, 2011, we understand further progress has been made on clarifying and resolving the remaining issues. We would like to summarize those discussions herein:

Park Preservation Act

As the project proponent, we understand that this project will have to satisfy the requirements set forth in the California Park Preservation Act, including mitigation for the loss of acreage at DBGC with new properties intended as replacement to the loss of the original park land. We will work with the County to identify sites that are considered suitable as replacement land.

Sound Walls

Based on Caltrans new Traffic Noise Analysis Protocol (the Protocol) dated May 2011, the golf course is considered an outdoor area of frequent human use, requiring noise analysis as an Activity Category C land use. Following the new Protocol, our consultant analyzed the noise level on the entire DBGC by assigning a receptor for each hole of the golf course in an area (tee box, fairway, or green) that best represents the highest expected traffic noise level for that hole. Additional receptors such as practice greens, the driving range, and the club house were also included in the new noise analysis. A total of 20 receptors were assigned and analyzed.

Future build noise modeling results presented in the Noise Study Memorandum prepared by our consultant (ICF International) dated November 15, 2011 indicate that DBGC would be exposed to traffic noise levels from SR-60 in the range of 61 to 81 dBA in design-year (2037). Out of 20 receptors measured for traffic noise levels, 14 receptors are predicted to approach or exceed the Noise Abatement Criteria (NAC) threshold of 67 dBA Leq(h)

Supervisor Don Knabe December 19, 2011 Page Two

(66 dBA or higher) for active sporting areas; four are located at the westerly side of DBGC, and ten are located at the easterly side of DBGC.

The noise modeling conducted by the consultant using 12 foot high and 14 foot high sound walls indicated that only one receptor on the westerly half of DBGC will receive a noise reduction of 5 dBA with a 12 foot high wall. The analysis also concluded that seven of the ten receptors that exceed the NAC threshold on the easterly half of DBGC will receive noise reduction of 5dBA with a 12 foot wall. No additional receptors on either side of the golf course were benefited by increasing the wall height from 12 to 14 feet. A copy of the Noise Analysis Memorandum prepared by our consultant (ICF International) is attached herein.

The estimated construction costs for the noise walls are \$932,000 and \$1,060,000 for the westerly half and easterly half of DBGC, respectively. For a noise wall to meet the "cost reasonableness" criteria, maximum per impacted and benefited receptor is \$55,000. Therefore, it is apparent that neither wall would meet the reasonableness criteria. However, with all seven impacted receptors on the easterly half of the golf course meeting the feasibility criteria (> 5dBA noise reduction), we will be recommending that a 12 foot high sound wall along the right edge of SR-60 for the easterly half of the golf course be constructed as part of the SR-57/SR-60 Confluence Project. The cost reasonable criteria may be met with local contributions (non Federal match) toward the construction of that noise wall.

Clubhouse and Snack Bar

The County Parks and Recreations staff have clarified this item. We understand the County's intention to "spruce up" the existing building and the breezeway with architectural cladding around the steel posts of the existing breezeway covers, and architectural façade with lattice or similar architectural treatment on the exterior walls of the clubhouse and the snack bars. The minor architectural improvements on the exterior of the clubhouse and snack bar are expected to cost under \$200,000.

Blueline Stream

The County Parks and Recreations staff have clarified this item. We understand the intent is to replace the existing concrete gutters across the fairways with underground pipes, and a complete sub-drain system be placed in all tees, bunkers and greens. The sub-drain pipes need to be connected to a drainage facility that eventually drains to the drainage channel on SR-60.

Golf Course Plan

We appreciate the input from the County staff on redesigning the DBGC. The design by Casey O'Callaghan will be the foundation for the design of the final freeway improvements on SR-60 and the Grand Avenue Interchange. We will commit to keeping the County staff continuously informed of the latest golf course design and the freeway improvements plans until the project is approved.

Fiscal Impact

City of Industry is fully aware that the freeway improvements will negatively impact the continuing operation of the golf course throughout the construction of the freeway and the golf courses' improvements. Such interruptions will result in reducing the number of golf course patrons and declining revenues to the County and the golf course operator for several years. Caltrans will serve the role of the right-of-way agent for the 57/60 Confluence Project after the approval of the environmental documents. The fiscal impact will be part of their appraisal process. Following the standard environmental process, those activities can take place only after both NEPA and CEQA approval have been obtained for this project.

Caltrans has requested that we seek the County's concurrence on the proposed improvements to the DBGC as outlined in my previous letter on January 25, 2011 with the clarifications provided herein. Considering the overall

Supervisor Don Knabe December 19, 2011 Page Three

benefits that the improved SR-60 and SR-57 will bring to the County residents, we urge your concurrence. These proposed improvements, developed through ongoing consultations with the County concerning the DBGC and the proposed SR-60/SR-57 Confluence project, will be incorporated into the project design and/or included as avoidance and minimization measures in the Draft EIR/EA, and included as measures to minimize harm (on the DBGC property) under Section 4(f) of the United States Department of Transportation Act.

Please be reminded that by executing your signature below, the County only concurs with the proposed golf course reconstructions and the associated improvements on the DBGC as described herein.

All future actions, including commenting on the Draft EIR/EA, and negotiating the right-of-ways and fiscal impacts remain completely open, and are not considered as part of the concurrence action herein.

Thank you for your time and continuing support. If you have any questions or concerns, please feel free to contact me at any time at (213) 897-0703.

Sincerely,

Ronald J. Kosinski, Deputy Director-Caltrans District 7

December 19, 20111 Date

Cc: Jorge Badel, County of Los Angeles Department of P&R Erin Stibal, County Supervisor Field Deputy Dickie Simmons, County Supervisor Field Deputy David Liu, City of Diamond Bar Wei Koo, WKE

Attachments:

Copy of January 25, 2011 letter from City of Industry Copy of March 15, 2011 letter from County Supervisor Knabe Noise Memo by ICF Jones and Stokes dated November 15, 2011

Concurrence by the County of Los Angeles Department of Parks and Recreations:

Name and Title

Agency

Date

"Caltrans improves mobility across California"



Memorandum

Date:	November 15, 2011
To:	Wei Koo, WKE
From:	Jason Volk Shilpa Trisal
Subject:	SR 57/SR 60 Confluence Project: Evaluating Golf Courses for noise abatement in the Caltrans Protocol - Diamond Bar Golf Course Noise Barrier Analysis

This memo contains a description of guidance regarding evaluation of golf courses for noise impacts under the Caltrans Protocol (the Protocol), and preliminary noise modeling results for the Diamond Bar golf course due to traffic noise from the SR 57/60 Confluence project.

A noise study report for the SR 57/SR 60 Confluence project was originally submitted in May 2010, when the 2006 version of the Protocol was still in effect. The May 2011 version of the Protocol contains updated guidance on how to evaluate cost-reasonableness specifically for golf courses. The change in Protocol guidance is described in the methodology section. The SR 57/SR 60 Confluence project will require re-evaluation under the May 2011 version of the Protocol, due to significant traffic and alignment revisions.

Methodology

Under the Protocol, noise abatement is evaluated for areas of frequent human use that would benefit from a lowered noise level. The Protocol provides the following description of noise abatement reasonableness.

The overall reasonableness of noise abatement is determined by the following three factors.

- The noise reduction design goal.
- The cost of noise abatement.
- The viewpoints of benefited receptors (including property owners and residents of the benefited receptors).

For a noise barrier to be considered reasonable from a cost perspective (cost-reasonable), the estimated cost of barrier construction should not exceed the total reasonableness allowance. The total reasonableness allowance is calculated by multiplying the cost-per-residence allowance by the number of benefited residences. If the cost of construction exceeds the total reasonableness

allowance, the noise barrier is generally described in the Noise Abatement Decision Report (NADR) as not reasonable.

In the case of evaluating individual residences, each residential outdoor area is considered an outdoor area of frequent human use, and evaluated as a single noise-sensitive receptor. In order to evaluate cost-reasonableness of noise abatement for outdoor sporting areas such as golf courses, where human use is transitory rather than stationary, the Protocol guidance indicates that such outdoor use should be evaluated in terms of an equivalent number of residential units.

Under the 2006 Protocol, golf courses are not specifically mentioned, but would be considered active sporting areas, which correspond to Activity Category B land use (active sporting areas were reassigned to Activity Category C under the May 2011 Protocol). The 2006 Protocol specified that the noise impact evaluation considers noise sensitive receptors located within 500 feet of a highway project. Protocol 2006 guidance for calculating cost-reasonableness for non-residential areas was described as follows:

Reasonableness allowances [for non-residential areas] may also be calculated... [such] that the number of 100-foot frontage units is used instead of the number of residential units. A frontage unit is the length of the frontage of the land use along the highway divided by 100 feet. The frontage length is not necessarily the entire frontage length of the parcel under consideration, but rather the length along the highway where there is frequent human use that would benefit from a reduced noise level. Frontage units are always rounded up to the next whole unit. (Caltrans Protocol 2006)

Using the frontage unit method, a golf course with two fairways along highway frontage with total frontage area of 800 feet would be equivalent to 8 frontage units, or 8 residential receptors for the purpose of calculating cost reasonableness.

Under the Protocol revised in May 2011, active sporting areas such as golf courses are considered Activity Category C land use. The May 2011 Protocol uses a different method from the 2006 Protocol which is not based on frontage units, in order to evaluate areas of outdoor use. In addition, noise-sensitive receptors located more than 500 feet from the highway project should be evaluated. The May 2011 Protocol specifies the following noise modeling guidelines to evaluate golf courses:

One receptor must be placed for each hole of the golf course in an area (tee box, fairway, or green) that best represents the highest expected traffic noise level for that hole. If other outdoor activity areas exist within the course, such as practice areas, picnic facilities, restaurant outdoor area, etc., each formalized activity area must be evaluated with a separate receptor. (Caltrans Protocol 2011)

Each receptor in this case would be equivalent to one residential unit for the purpose of calculating noise abatement reasonableness allowances.

Using the golf course with two fairways along highway frontage from the previous example, each fairway would be represented by one receptor, located in the area where traffic noise levels

are expected to be highest. This would be equivalent to 2 residential receptors. However, the modeling analysis of the area is not limited to those fairways located along highway frontage; any additional outdoor activity areas such as those described above would be evaluated as a separate receptor. The reasonableness calculations would also take into account any such areas not adjacent to the highway project that could receive at least 5 dB of noise reduction from a noise barrier. The total count of receptors in this example could be greater than 2 if there are other fairways or other outdoor use activities in the area. However, since the achievable noise reduction decreases with distance from the face of the barrier, acoustical benefits are limited at distances of greater than 500 feet from the barrier.

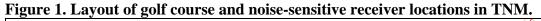
What the change in Protocol guidance means for the Confluence Project

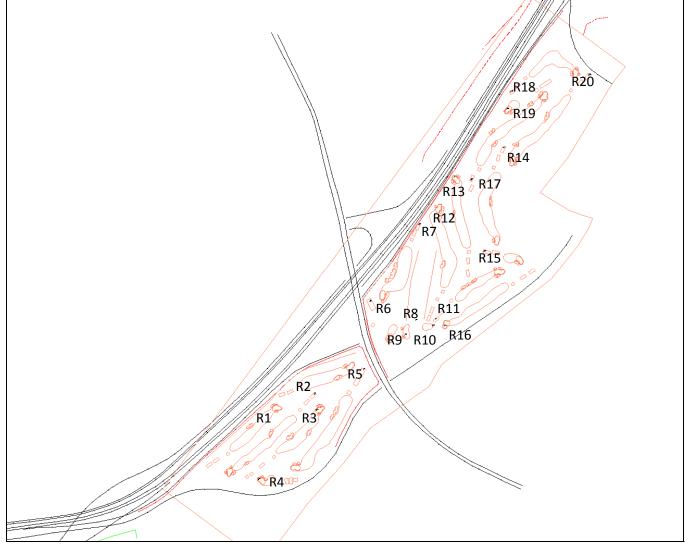
Due to the change in methodology guidance in the Protocol, the number of receivers at the Diamond Bar golf course to be evaluated for reasonableness is unknown until the noise analysis is updated. Under the 2006 protocol, if the golf course was treated as a frequent outdoor use area, reasonableness would have been calculated using a constant number of 75 frontage units (i.e. the golf course covers ~7,500 linear feet of highway frontage). Under the 2011 Protocol, there is specific guidance for golf courses, and they are to be evaluated as outdoor use areas (Activity Category C). One receiver would be located on each fairway, green, or tee of the golf course. Based on noise modeling results, the number of receivers considered impacted under Activity Category C (66 dBA or greater) are counted, and then the number of impacted receivers that would receive at least 5 dB of noise reduction from a noise barrier is determined. To summarize: under the 2006 Protocol using the frontage unit method, reasonableness would be evaluated for 75 receptors. Under the 2011 Protocol, reasonableness is evaluated for each individual outdoor use present in the area. In the case of the Diamond Bar golf course this would correspond to one noise sensitive receiver for each hole on the course plus two additional outdoor uses, for a total of 20 noise-sensitive receivers.

Protocol guidance indicates that the reasonable cost allowance per benefited receiver is based on the annually-adjusted Construction Price Index published by Caltrans. A receiver is considered benefited if it receives at least 5 dBA of noise reduction from a noise abatement measure such as a noise barrier. In Year 2011, the allowance is \$55,000 per benefited receiver.

Noise modeling results

The updated Diamond Bar golf course design was evaluated for noise-sensitive use, and traffic noise levels were modeled using FHWA TNM and traffic volumes provided by KOA Corporation. The location of noise-sensitive receivers is shown in Figure 1.





Three cases were evaluated in TNM for the golf course under future build conditions: No-barrier, inclusion of 12-foot barriers (shown as the red lines in Figure 1), and 14-foot barriers. Barriers were evaluated to determine the receiver locations that would get 5 dBA of noise reduction from a barrier. A noise barrier with a total length of 2,220 feet was modeled for the western segment of the course on the west side of Grand Avenue (Receivers R1 through R5). A noise barrier with a total length of 2,970 feet was modeled for the course on the east side of Grand Avenue (Receivers R6 through R20). Barrier designs were assumed to be located with footings at edge of shoulder. Per the Highway Design Manual, a 14-foot barrier height is the

maximum height that should be considered for this configuration. Preliminary traffic noise modeling results are shown in Table 1.

Receiver Location	No Barrier Noise Level (dBA Leq)	Noise Level with a 12- foot Barrier (dBA Leq)	Noise Reduction provided by a 12- foot Barrier (dB)	Does the 12-foot Barrier Achieve a minimum 5 dB of noise reduction?	Noise Level with a 14- foot Barrier (dBA Leq)	Noise Reduction provided by a 14- foot Barrier (dB)	Does the 14-foot Barrier Achieve a minimum 5 dB of noise reduction?
R01	75	69	6	Yes	68	7	Yes
R02	<mark>68</mark>	65	3	No	65	3	No
R03	66	65	1	No	64	2	No
R04	<mark>67</mark>	66	1	No	66	1	No
R05	64	64	0	No	64	0	No
R06	63	63	0	No	63	0	No
R07	81	72	9	Yes	70	11	Yes
R08	66	65	1	No	65	1	No
R09	66	65	1	No	65	1	No
R10	64	64	0	No	63	1	No
R11	64	63	1	No	63	1	No
R12	<mark>76</mark>	68	8	Yes	67	9	Yes
R13	78	68	10	Yes	67	11	Yes
<mark>R14</mark>	<mark>72</mark>	66	6	Yes	65	7	Yes
R15	65	63	2	No	63	2	No
R16	64	64	0	No	64	0	No
R17	71	66	5	Yes	65	6	Yes
R18	<mark>76</mark>	69	7	Yes	68	8	Yes
R19	77	70	7	Yes	68	9	Yes
R20	67	66	1	No	66	1	No
Number of receivers that would get 5 dB of noise reduction from a 12-foot barrier:				8	Number of receivers that would get 5 dB of noise reduction from a 14-foot barrier:		8
Reasonable cost allowance based on 2011 Caltrans CPI:				\$440,000	allowand	onable cost e based on altrans CPI:	\$440,000

Table 1. Noise modeling results at the golf course

The results in Table 1 indicate that a 14-foot barrier west of Grand Avenue only provides benefit to 1 of the 5 holes on the western segment of the course, and a 14-foot barrier east of Grand

Avenue provides benefit to 7 of the 13 holes on the eastern segment of the course. The benefit of a western barrier is therefore limited.

Barrier noise reductions across the entire golf course playing area were also estimated using the noise contour calculation feature of TNM. The 5-decibel barrier noise reduction contours for 14-foot walls along the SR 57/60 golf course frontage are shown in Figure 2. Note that this information is provided only for the purpose of visualizing the predicted extent of noise barrier benefit at the golf course. The noise modeling results shown in Table 1 are consistent with data provided in the NSR and would be used for any consideration of noise barriers.

Under the Protocol, reasonable cost allowances are calculated based on the number of receivers benefited. For any noise barrier to be considered reasonable from a cost perspective the estimated cost of the noise barrier should be equal to or less than the total cost allowance calculated for the barrier. The cost calculations of the noise barrier should include all items appropriate and necessary for construction of the barrier, such as traffic control, drainage modification, and retaining walls. The design of noise barriers presented in this memorandum is preliminary only and has been conducted at a level appropriate for environmental review but not for final design of the project.

References

Caltrans. 2006. Traffic Noise Analysis Protocol for New Highway Construction, Reconstruction, and Retrofit Barrier Projects. August. Sacramento, CA.

Caltrans. 2011. Traffic Noise Analysis Protocol for New Highway Construction, Reconstruction, and Retrofit Barrier Projects. May. Sacramento, CA.

KOA Corporation. 2011. SR-60 Year 2037 Traffic Conditions. Prepared for WKE, Inc., Engineers and Planners. September.



Figure 2 Location of 5 dB Barrier Noise Reduction Contours

APPENDIX B-9

DEPARTMENT OF TRANSPORTATION DISTRICT 7 DIVISION OF ENVIRONMENTAL PLANNING 100 MAIN STREET, SUITE 100 LOS ANGELES, CA 90012-3606 FAX (213) 897-2593 TTY (213) 897-4937



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December 19, 2011

Honorable Supervisor Don Knabe County Supervisor Fourth District 822 Kenneth Hahn Hall of Administration 500 West Temple Street Los Angeles, CA 90012

Attention: Julie Moore, Transportation Deputy

Subject: SR-57/SR-60 Confluence Project at Grand Avenue Interchange

Dear Supervisor Knabe:

This letter is a follow up to your letter to the City of Industry dated March 15, 2011 regarding the few remaining issues on the Diamond Bar Golf Course (DBGC) that required clarifications. City of Industry and City of Diamond Bar, in cooperation with the State Department of Transportation (Caltrans) remain steadfast in developing the SR-57/SR-60 Freeway Confluence Project and continuing to pursue approvals through the CEQA and NEPA process. We appreciate the cooperative and engaging staff input we have been receiving from the County throughout the project development process.

As result of the meeting between the City of Industry and the County of Los Angeles Department of Parks and Recreation on June 8, 2011, we understand further progress has been made on clarifying and resolving the remaining issues. We would like to summarize those discussions herein:

Park Preservation Act

As the project proponent, we understand that this project will have to satisfy the requirements set forth in the California Park Preservation Act, including mitigation for the loss of acreage at DBGC with new properties intended as replacement to the loss of the original park land. We will work with the County to identify sites that are considered suitable as replacement land.

Sound Walls

Based on Caltrans new Traffic Noise Analysis Protocol (the Protocol) dated May 2011, the golf course is considered an outdoor area of frequent human use, requiring noise analysis as an Activity Category C land use. Following the new Protocol, our consultant analyzed the noise level on the entire DBGC by assigning a receptor for each hole of the golf course in an area (tee box, fairway, or green) that best represents the highest expected traffic noise level for that hole. Additional receptors such as practice greens, the driving range, and the club house were also included in the new noise analysis. A total of 20 receptors were assigned and analyzed.

Future build noise modeling results presented in the Noise Study Memorandum prepared by our consultant (ICF International) dated November 15, 2011 indicate that DBGC would be exposed to traffic noise levels from SR-60 in the range of 61 to 81 dBA in design-year (2037). Out of 20 receptors measured for traffic noise levels, 14 receptors are predicted to approach or exceed the Noise Abatement Criteria (NAC) threshold of 67 dBA Leq(h)

Supervisor Don Knabe December 19, 2011 Page Two

(66 dBA or higher) for active sporting areas; four are located at the westerly side of DBGC, and ten are located at the easterly side of DBGC.

The noise modeling conducted by the consultant using 12 foot high and 14 foot high sound walls indicated that only one receptor on the westerly half of DBGC will receive a noise reduction of 5 dBA with a 12 foot high wall. The analysis also concluded that seven of the ten receptors that exceed the NAC threshold on the easterly half of DBGC will receive noise reduction of 5dBA with a 12 foot wall. No additional receptors on either side of the golf course were benefited by increasing the wall height from 12 to 14 feet. A copy of the Noise Analysis Memorandum prepared by our consultant (ICF International) is attached herein.

The estimated construction costs for the noise walls are \$932,000 and \$1,060,000 for the westerly half and easterly half of DBGC, respectively. For a noise wall to meet the "cost reasonableness" criteria, maximum per impacted and benefited receptor is \$55,000. Therefore, it is apparent that neither wall would meet the reasonableness criteria. However, with all seven impacted receptors on the easterly half of the golf course meeting the feasibility criteria (> 5dBA noise reduction), we will be recommending that a 12 foot high sound wall along the right edge of SR-60 for the easterly half of the golf course be constructed as part of the SR-57/SR-60 Confluence Project. The cost reasonable criteria may be met with local contributions (non Federal match) toward the construction of that noise wall.

Clubhouse and Snack Bar

The County Parks and Recreations staff have clarified this item. We understand the County's intention to "spruce up" the existing building and the breezeway with architectural cladding around the steel posts of the existing breezeway covers, and architectural façade with lattice or similar architectural treatment on the exterior walls of the clubhouse and the snack bars. The minor architectural improvements on the exterior of the clubhouse and snack bar are expected to cost under \$200,000.

Blueline Stream

The County Parks and Recreations staff have clarified this item. We understand the intent is to replace the existing concrete gutters across the fairways with underground pipes, and a complete sub-drain system be placed in all tees, bunkers and greens. The sub-drain pipes need to be connected to a drainage facility that eventually drains to the drainage channel on SR-60.

Golf Course Plan

We appreciate the input from the County staff on redesigning the DBGC. The design by Casey O'Callaghan will be the foundation for the design of the final freeway improvements on SR-60 and the Grand Avenue Interchange. We will commit to keeping the County staff continuously informed of the latest golf course design and the freeway improvements plans until the project is approved.

Fiscal Impact

City of Industry is fully aware that the freeway improvements will negatively impact the continuing operation of the golf course throughout the construction of the freeway and the golf courses' improvements. Such interruptions will result in reducing the number of golf course patrons and declining revenues to the County and the golf course operator for several years. Caltrans will serve the role of the right-of-way agent for the 57/60 Confluence Project after the approval of the environmental documents. The fiscal impact will be part of their appraisal process. Following the standard environmental process, those activities can take place only after both NEPA and CEQA approval have been obtained for this project.

Caltrans has requested that we seek the County's concurrence on the proposed improvements to the DBGC as outlined in my previous letter on January 25, 2011 with the clarifications provided herein. Considering the overall

Supervisor Don Knabe December 19, 2011 Page Three

benefits that the improved SR-60 and SR-57 will bring to the County residents, we urge your concurrence. These proposed improvements, developed through ongoing consultations with the County concerning the DBGC and the proposed SR-60/SR-57 Confluence project, will be incorporated into the project design and/or included as avoidance and minimization measures in the Draft EIR/EA, and included as measures to minimize harm (on the DBGC property) under Section 4(f) of the United States Department of Transportation Act.

Please be reminded that by executing your signature below, the County only concurs with the proposed golf course reconstructions and the associated improvements on the DBGC as described herein.

All future actions, including commenting on the Draft EIR/EA, and negotiating the right-of-ways and fiscal impacts remain completely open, and are not considered as part of the concurrence action herein.

Thank you for your time and continuing support. If you have any questions or concerns, please feel free to contact me at any time at (213) 897-0703.

Sincerely,

Ronald J. Kosinski, Deputy Director-Caltrans District 7

December 19, 20111 Date

Cc: Jorge Badel, County of Los Angeles Department of P&R Erin Stibal, County Supervisor Field Deputy Dickie Simmons, County Supervisor Field Deputy David Liu, City of Diamond Bar Wei Koo, WKE

Attachments:

Copy of January 25, 2011 letter from City of Industry Copy of March 15, 2011 letter from County Supervisor Knabe Noise Memo by ICF Jones and Stokes dated November 15, 2011

Concurrence by the County of Los Angeles Department of Parks and Recreations:

LOS ANCALLS COUNTY DEPT OF PARES & RECREATION DIRECTOR 3-5-12

Name and Title

Agency

Date

"Caltrans improves mobility across California"



CITY OF INDUSTRY

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January 25, 2011

Honorable Supervisor Don Knabe County Supervisor Fourth District 822 Kenneth Hahn Hall of Administration 500 West Temple Street Los Angeles, CA 90012

Attention: Julie Moore- Transportation Deputy

Subject: SR-57/ SR-60 Confluence Project at Grand Avenue Interchange

Dear Supervisor Knabe:

The California Department of Transportation ("Caltrans") is proposing to reconfigure the 2.5mile confluence of SR-57 and SR-60 by adding auxiliary lanes and reconfiguring the on-and off-ramps at Grand Avenue. Caltrans is the lead agency for the Environmental Impact Report/Environmental Assessment (EIR/EA) under preparation for this project. The City of Industry is the project proponent. Due to the potential for permanent and temporary right-ofway takes from Diamond Bar Golf Course (considered a public recreational area), application of Section 4(f) of the Department of Transportation Act of 1996 at the federal level and Parks Preservation Act of 1974 at the state level are triggered.

The following general environmental effects to the Diamond Bar Golf Course property have been identified based on a preliminary assessment. Detailed impacts will be presented in the Draft EIR/EA that will be ready for circulation in summer 2011:

- Permanent right-of-way acquisition of less than 12 acres of land from the Golf Course, which would affect several holes from play [four (4) holes under Freeway Alternative 2, and seven (7) holes under Freeway Alternative 3]
- Temporary construction easement of less than 5 acres
- Construction of new retaining walls along the freeway mainline, Grand Avenue and Golden Springs Drive (mostly at top of the slopes)
- Relocation of a cart path tunnel under Grand Avenue
- Phased closure of portions of the golf course during construction
- Intermittent disruption of play during construction
- Removal of some earth berms, screening trees and high net fences
- Disruption of existing cart paths
- Local access interruption due to construction of Grand Avenue and Golden Springs Drive widening

Supervisor Don Knabe January 25, 2011 Page Two

• Other nuisance impacts related to increase in noise, dust, presence of construction vehicles, etc

As part of an ongoing effort to minimize adverse effects on the Diamond Bar Golf Course property, a plan for reconfiguration of the golf course has been prepared. In September, 2008, the City of Industry hired a golf course consultant, Cascy O'Callaghan Golf Course Design, Inc., who had extensive experience working with the County on similar golf course projects. Since that time, Casey O'Callaghan Golf Course Design, Inc. has been working on various schemes for reconfiguration and looking at ways to minimize playability effects on the golf course, which included a design option where seven holes would be directly affected. During the preparation of this plan, Casey O'Callaghan Golf Course Design, Inc., the City and Caltrans have been in touch with the County and have taken their feedback into account. A letter from the County of Los Angeles Department of Parks and Recreation dated June 24, 2010 (attached herein) provided the basis for the redesign of the golf course improvement. Attached is the latest golf course plan dated December 7, 2010, which includes the following features or measures to minimize harm:

- All eighteen tee complexes will be reconstructed
- All eighteen green complexes, including greenside sand bunkers will be reconstructed
- All fairway sand bunkers will be reconstructed
- The wall to wall cart path system will be maintained. There are areas where the existing cart path must be demolished and removed and a new cart path installed because of golf hole location changes
- The practice putting green will be reconstructed
- The existing hole #9 green complex will be converted to a practice pitching green with sand bunkers
- The practice range tee will be located further to the south by approximately fifty feet to create a safer relationship between the practice range and hole #2. Hole #2 will be shifted further south
- The concrete channel surface drains that bi-sect the fairways throughout the golf course will be replaced with under-drain pipes and the original ground will be grassed
- Existing golf course features such as protective netting and trees displaced by the project will be replaced as required for the safety, aesthetics, and playability of the golf course

The proposed golf course modifications will allow the golf course to maintain a par 72. The modifications will allow the golf course to increase from 6,801 yards to 6,848 yards. Other enhancements to the golf course would also be undertaken to address aesthetic impacts, these are:

• Washing or repainting the exterior of the clubhouse facility and snack bar that may be affected by construction dust

Supervisor Don Knabe January 25, 2011 Page Three

Following the requirements of the California Public Park Preservation Act, the project will also be responsible for replacing and/or remediating the permanent loss of golf course land in order to construct the proposed freeway interchange project. The City of Industry, as the project proponent, will work with the County in identifying potential sites for substitution of lost park land, should it be necessary, in order to meet the requirements of the Park Preservation Act. The acquisition of park replacement land will be conducted as part of the right-of-way work, and it shall take place only should Project Approval be granted following the approval of the environmental documents.

In addition, all feasible BMPs and standard protocols would be followed during construction to reduce construction-period impacts in areas such as stormwater, water quality, air quality, and noise. Detailed analysis of construction period impacts and measures to avoid, minimize, and mitigate these impacts will be presented in the Draft EIR/EA, which will be made available to the County for review.

At this point of the environmental process, Caltrans seeks the County's concurrence on the attached plan dated December 7, 2010. This would allow Caltrans to move forward and analyze the impacts of this reconfiguration plan in its Draft EIR/EA.

By executing your signature below, you are not waiving any rights to comment on the Draft EIR/EA. Thank you for your cooperation in this matter and if you have any questions, please feel free to contact us at any time.

John D. Ballas

City Engineer

Attachments:

Proposed Reconfiguration Plan for Freeway Alt 3
 Copy of County Letter dated June 24, 2010
 Cc: Jorge Badel / County Los Angeles Department of P&R
 Erin Stibal / County Supervisor Field Deputy
 Dickie Simmons/ County Supervisor Field Deputy
 David Liu/ City of Diamond Bar

Wei Koo/ WKE

Concurrence by County of Los Angeles Department of Parks and Recreation

Name and Title

Agency

Date

JDB:WK:mk



COUNTY OF LOS ANGELES

DEPARTMENT OF PARKS AND RECREATION

"Creating Community Through People, Parks and Programs"

Russ Guiney, Director

THAT & SOLL

June 24, 2010

Mr. Wei Koo, SE WKW, INC 400 N. Tustin Avenue, Suite 295 Santa Ana, California 92705

Dear Mr. Koo:

SR-57/SR-60 CONFLUENCE IMPROVEMENTS DIAMOND BAR GOLF COURSE (DBGC) IMPACT – REMEDIAL REQUIREMENTS

In regards to the above reference freeway project, its encroachment and impact on the DBGC, the County of Los Angeles is requiring the following remedial action under Alternative 3A-2:

- Construct/reconstruct 18 tee complexes with sufficient area for what is traditionally referenced as back, middle, forward and family tees.
- Construct/reconstruct 18 green complexes, with bunkering.
- Retention of "wall to wall" cart path.
- Construct/reconstruct of fairway bunkers.
- Construct/reconstruct existing practice putting green, currently located immediately behind the 1st tee complex.
- Conversion the existing 9th green to a practice pitching green, with bunker.
- Reconstruct of existing driving range tee-line.
- "Burying" Blue Line stream.
- Construct sound wall (with landscaping) separating the DBGC from the 57/60 freeway interchange and its encroachment onto the course.
- Upgrades to exterior of existing clubhouse and snack bar facility.
- Protective screening and trees as required for safety and playability.

The above is a preliminary general scope and subject to adjustment by the County. Should you have any questions or comments, do not hesitate to contact me at (626) 821-4649.

Sincerely,

hore A. Badal

Jorge A. Badel Senior Golf Director

c: Erin Stibal, Parks Deputy, Fourth District Joan Rupert, Parks and Recreation File

CONVED : 1111 1 2 2010

Contracts, Golf, & Special Districts Division • 301 N. Baldwin Ave. • Arcadia, CA 91007-2697 • (626) 821-4600



BOARD OF SUPERVISORS COUNTY OF LOS ANGELES

822 KENNETH HAHN HALL OF ADMINISTRATION / LOS ANGELES, CALIFORNIA 90012 Telephone (213) 974-4444 / FAX (213) 626-6941

> DON KNABE SUPERVISOR, FOURTH DISTRICT

March 15, 2011

Mr. John D. Ballas City Engineer City of Industry 15625 East Stafford Street City of Industry, California 91744-0366

Dear Mr. Ballas:

We are in receipt of your letter dated January 25, 2011, regarding the SR-57/SR-60 Confluence Project at Grand Avenue Interchange and its impact on the Diamond Bar Golf Course (DBGC). Per the Department of Parks and Recreation's letter dated June 24, 2010, omissions and clarifications must be addressed:

Park Preservation Act

Your letter questioned the necessity of identifying potential sites for the substitution of lost park land. Please know that from the County's perspective, it is without question, that it will be necessary to replace the loss of any and all parkland resulting from the proposed project.

Sound Wall

The expansion of the freeway and its encroachment onto the DBGC will negatively impact the golfing experience as freeway traffic will now be situated even closer to the golfing public. Installation of a sound wall separating the DBGC from the 57/60 freeway and its encroachment onto the golf course is required to mitigate the increased noise impact associated with the construction and operation of the project.

Clubhouse and Snack Bar

Improvements to the exterior of the existing clubhouse and snack bar facility will also be required in order to provide balance between the redesigned golf course and the now outdated clubhouse exterior.

Blueline Stream

As a point of clarification, please note that undergrounding the blue line stream will require that Caltrans direct all surface water from the golf course (either irrigation water or nuisance water) to existing Caltrans easements. All drainage for tees, greens and bunkers will be directed by subgrade piping to existing Caltrans easements. The existing golf course soil condition does not allow for normal percolation; therefore, collecting water in a drywell is not acceptable.

Mr. John D. Ballas March 15, 2011 Page 2

Golf Course Plan

In concept, we agree that the golf course plan dated December 7, 2010, designed by Casey O'Callaghan could be used as one of the alternatives to the proposed project. At this point, with respect to the playability and operation of the golf course, this design appears to meet the needs of the public and the concessionaire, but will be watched closely for any changes.

Fiscal Impact

The proposed golf course renovation will cause a decline or possible elimination of revenue for the County and its private concessionaire during the construction phase of the project. It is required that the County and or its concessionaire be compensated in full, for all lost revenues, during the construction phase and for any period thereafter required for play to return to its preconstruction levels.

I lopk forward to continuing this highly collaborative process with you.

Sinderely,

DON KNABE

Supervisor, Fourth District County of Los Angeles

DK:co

Enclosures

c: Mr. David Liu, City of Diamond Bar

Mr. Wei Koo, SE, WKE

Mr. Jorge Badel, Department of Parks and Recreation

Ms. Joan Rupert, Department of Parks and Recreation

Mr. Rick Velasquez, Chief of Staff

Ms. Julie Moore, Deputy

Mr. Dickie Simmons, Deputy

Ms. Erin Stibal



Memorandum

Date:	November 15, 2011
То:	Wei Koo, WKE
From:	Jason Volk Shilpa Trisal
Subject:	SR 57/SR 60 Confluence Project: Evaluating Golf Courses for noise abatement in the Caltrans Protocol - Diamond Bar Golf Course Noise Barrier Analysis

This memo contains a description of guidance regarding evaluation of golf courses for noise impacts under the Caltrans Protocol (the Protocol), and preliminary noise modeling results for the Diamond Bar golf course due to traffic noise from the SR 57/60 Confluence project.

A noise study report for the SR 57/SR 60 Confluence project was originally submitted in May 2010, when the 2006 version of the Protocol was still in effect. The May 2011 version of the Protocol contains updated guidance on how to evaluate cost-reasonableness specifically for golf courses. The change in Protocol guidance is described in the methodology section. The SR 57/SR 60 Confluence project will require re-evaluation under the May 2011 version of the Protocol, due to significant traffic and alignment revisions.

Methodology

Under the Protocol, noise abatement is evaluated for areas of frequent human use that would benefit from a lowered noise level. The Protocol provides the following description of noise abatement reasonableness.

The overall reasonableness of noise abatement is determined by the following three factors.

- The noise reduction design goal.
- The cost of noise abatement.
- The viewpoints of benefited receptors (including property owners and residents of the benefited receptors).

For a noise barrier to be considered reasonable from a cost perspective (cost-reasonable), the estimated cost of barrier construction should not exceed the total reasonableness allowance. The total reasonableness allowance is calculated by multiplying the cost-per-residence allowance by the number of benefited residences. If the cost of construction exceeds the total reasonableness

allowance, the noise barrier is generally described in the Noise Abatement Decision Report (NADR) as not reasonable.

In the case of evaluating individual residences, each residential outdoor area is considered an outdoor area of frequent human use, and evaluated as a single noise-sensitive receptor. In order to evaluate cost-reasonableness of noise abatement for outdoor sporting areas such as golf courses, where human use is transitory rather than stationary, the Protocol guidance indicates that such outdoor use should be evaluated in terms of an equivalent number of residential units.

Under the 2006 Protocol, golf courses are not specifically mentioned, but would be considered active sporting areas, which correspond to Activity Category B land use (active sporting areas were reassigned to Activity Category C under the May 2011 Protocol). The 2006 Protocol specified that the noise impact evaluation considers noise sensitive receptors located within 500 feet of a highway project. Protocol 2006 guidance for calculating cost-reasonableness for non-residential areas was described as follows:

Reasonableness allowances [for non-residential areas] may also be calculated... [such] that the number of 100-foot frontage units is used instead of the number of residential units. A frontage unit is the length of the frontage of the land use along the highway divided by 100 feet. The frontage length is not necessarily the entire frontage length of the parcel under consideration, but rather the length along the highway where there is frequent human use that would benefit from a reduced noise level. Frontage units are always rounded up to the next whole unit. (Caltrans Protocol 2006)

Using the frontage unit method, a golf course with two fairways along highway frontage with total frontage area of 800 feet would be equivalent to 8 frontage units, or 8 residential receptors for the purpose of calculating cost reasonableness.

Under the Protocol revised in May 2011, active sporting areas such as golf courses are considered Activity Category C land use. The May 2011 Protocol uses a different method from the 2006 Protocol which is not based on frontage units, in order to evaluate areas of outdoor use. In addition, noise-sensitive receptors located more than 500 feet from the highway project should be evaluated. The May 2011 Protocol specifies the following noise modeling guidelines to evaluate golf courses:

One receptor must be placed for each hole of the golf course in an area (tee box, fairway, or green) that best represents the highest expected traffic noise level for that hole. If other outdoor activity areas exist within the course, such as practice areas, picnic facilities, restaurant outdoor area, etc., each formalized activity area must be evaluated with a separate receptor. (Caltrans Protocol 2011)

Each receptor in this case would be equivalent to one residential unit for the purpose of calculating noise abatement reasonableness allowances.

Using the golf course with two fairways along highway frontage from the previous example, each fairway would be represented by one receptor, located in the area where traffic noise levels

are expected to be highest. This would be equivalent to 2 residential receptors. However, the modeling analysis of the area is not limited to those fairways located along highway frontage; any additional outdoor activity areas such as those described above would be evaluated as a separate receptor. The reasonableness calculations would also take into account any such areas not adjacent to the highway project that could receive at least 5 dB of noise reduction from a noise barrier. The total count of receptors in this example could be greater than 2 if there are other fairways or other outdoor use activities in the area. However, since the achievable noise reduction decreases with distance from the face of the barrier, acoustical benefits are limited at distances of greater than 500 feet from the barrier.

What the change in Protocol guidance means for the Confluence Project

Due to the change in methodology guidance in the Protocol, the number of receivers at the Diamond Bar golf course to be evaluated for reasonableness is unknown until the noise analysis is updated. Under the 2006 protocol, if the golf course was treated as a frequent outdoor use area, reasonableness would have been calculated using a constant number of 75 frontage units (i.e. the golf course covers ~7,500 linear feet of highway frontage). Under the 2011 Protocol, there is specific guidance for golf courses, and they are to be evaluated as outdoor use areas (Activity Category C). One receiver would be located on each fairway, green, or tee of the golf course. Based on noise modeling results, the number of receivers considered impacted under Activity Category C (66 dBA or greater) are counted, and then the number of impacted receivers that would receive at least 5 dB of noise reduction from a noise barrier is determined. To summarize: under the 2006 Protocol using the frontage unit method, reasonableness would be evaluated for 75 receptors. Under the 2011 Protocol, reasonableness is evaluated for each individual outdoor use present in the area. In the case of the Diamond Bar golf course this would correspond to one noise sensitive receiver for each hole on the course plus two additional outdoor uses, for a total of 20 noise-sensitive receivers.

Protocol guidance indicates that the reasonable cost allowance per benefited receiver is based on the annually-adjusted Construction Price Index published by Caltrans. A receiver is considered benefited if it receives at least 5 dBA of noise reduction from a noise abatement measure such as a noise barrier. In Year 2011, the allowance is \$55,000 per benefited receiver.

Noise modeling results

The updated Diamond Bar golf course design was evaluated for noise-sensitive use, and traffic noise levels were modeled using FHWA TNM and traffic volumes provided by KOA Corporation. The location of noise-sensitive receivers is shown in Figure 1.

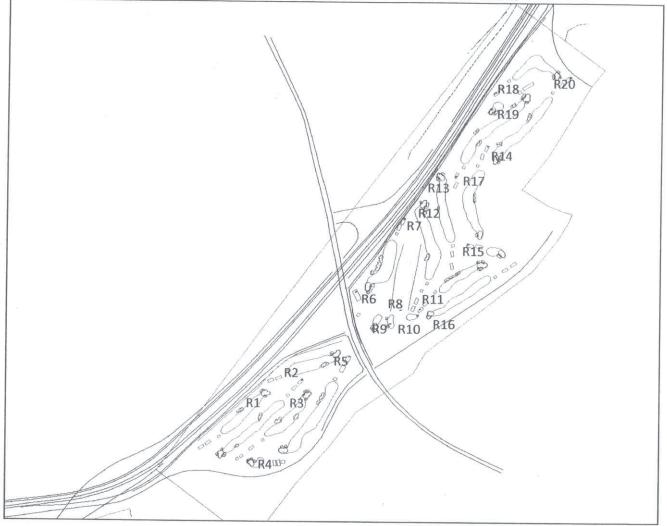


Figure 1. Layout of golf course and noise-sensitive receiver locations in TNM.

Three cases were evaluated in TNM for the golf course under future build conditions: No-barrier, inclusion of 12-foot barriers (shown as the red lines in Figure 1), and 14-foot barriers. Barriers were evaluated to determine the receiver locations that would get 5 dBA of noise reduction from a barrier. A noise barrier with a total length of 2,220 feet was modeled for the western segment of the course on the west side of Grand Avenue (Receivers R1 through R5). A noise barrier with a total length of 2,970 feet was modeled for the course on the east side of Grand Avenue (Receivers R6 through R20). Barrier designs were assumed to be located with footings at edge of shoulder. Per the Highway Design Manual, a 14-foot barrier height is the

maximum height that should be considered for this configuration. Preliminary traffic noise modeling results are shown in Table 1.

Receiver Location	Noise mod No Barrier Noise Level (dBA Leq)	Noise Level with a 12- foot Barrier (dBA Leq)	Noise Reduction provided by a 12- foot Barrier (dB)	Does the 12-foot Barrier Achieve a minimum 5 dB of noise reduction?	Noise Level with a 14- foot Barrier (dBA Leq)	Noise Reduction provided by a 14- foot Barrier (dB)	Does the 14-foot Barrier Achieve a minimum 5 dB of noise reduction?
R01	75	69	6	Yes	68	7	Yes
R02	68	65	3	No	65	3	No
R03	66	65	1	No	64	2	No
R04	67	66	1	No	66	1	No
R05	64	64	0	No	64	0	No
R06	63	63	0	No	63	0	No
R07	81	72	9	Yes	70	11	Yes
R08	66	65	1	No	65	1	No
R09	66	65	1	No	65	1	No
R10	64	64	0	No	63	1 .	No
R11	64	63	1	No	63	1	No
R12	76	68	8	Yes	67	9	Yes
R13	78	68	10	Yes	67	11	Yes
R14	72	66	6	Yes	65	7	Yes
R15	65	63	2	No	63	2	No
R16	64	64	0	No	64	0	No
R17	71	66	5	Yes	65	6	Yes
R18	76	69	7	Yes	68	8	Yes
R19	77	70	7	Yes	68	9	Yes
R20	67	66	1	No	66	1	No
	er of receivers lise reduction	TO A REAL BUILD AND A REAL PROPERTY AND		8	that wou of noise	f receivers Id get 5 dB reduction n a 14-foot barrier:	8
Reasonable cost allowance based on 2011 Caltrans CPI:				\$440,000	Reasonable cost allowance based on 2011 Caltrans CPI:		\$440,000

Table 1. Noise modeling results at the golf course

The results in Table 1 indicate that a 14-foot barrier west of Grand Avenue only provides benefit to 1 of the 5 holes on the western segment of the course, and a 14-foot barrier east of Grand

Avenue provides benefit to 7 of the 13 holes on the eastern segment of the course. The benefit of a western barrier is therefore limited.

Barrier noise reductions across the entire golf course playing area were also estimated using the noise contour calculation feature of TNM. The 5-decibel barrier noise reduction contours for 14-foot walls along the SR 57/60 golf course frontage are shown in Figure 2. Note that this information is provided only for the purpose of visualizing the predicted extent of noise barrier benefit at the golf course. The noise modeling results shown in Table 1 are consistent with data provided in the NSR and would be used for any consideration of noise barriers.

Under the Protocol, reasonable cost allowances are calculated based on the number of receivers benefited. For any noise barrier to be considered reasonable from a cost perspective the estimated cost of the noise barrier should be equal to or less than the total cost allowance calculated for the barrier. The cost calculations of the noise barrier should include all items appropriate and necessary for construction of the barrier, such as traffic control, drainage modification, and retaining walls. The design of noise barriers presented in this memorandum is preliminary only and has been conducted at a level appropriate for environmental review but not for final design of the project.

References

Caltrans. 2006. Traffic Noise Analysis Protocol for New Highway Construction, Reconstruction, and Retrofit Barrier Projects. August. Sacramento, CA.

Caltrans. 2011. Traffic Noise Analysis Protocol for New Highway Construction, Reconstruction, and Retrofit Barrier Projects. May. Sacramento, CA.

KOA Corporation. 2011. SR-60 Year 2037 Traffic Conditions. Prepared for WKE, Inc., Engineers and Planners. September.

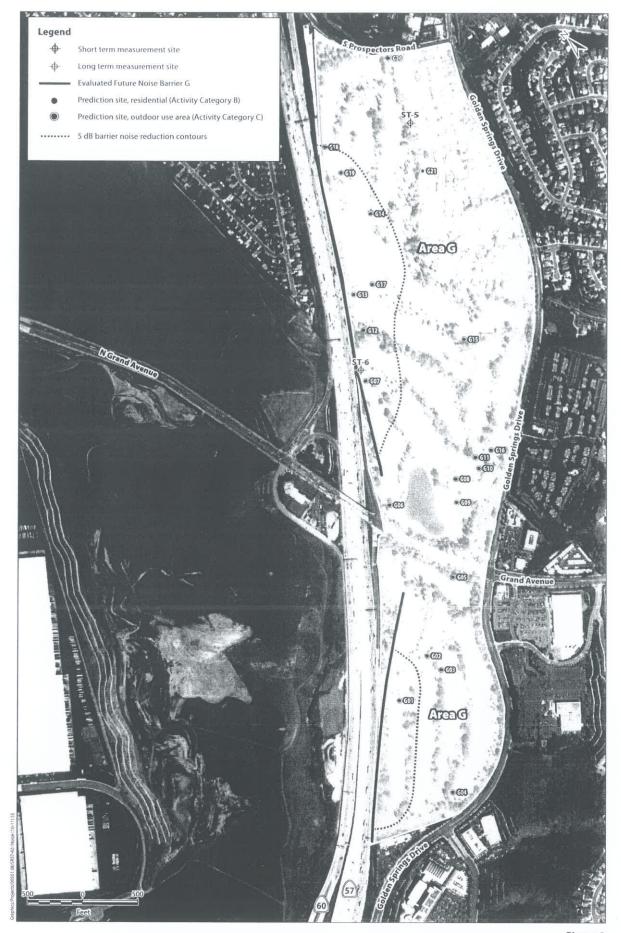


Figure 2 Location of 5 dB Barrier Noise Reduction Contours