Memorandum

Date: March 19, 2013

To: Cristin Hallissy and Ngoc Bui, Caltrans District 4

From: Lynn McIntyre, URS, on behalf of Santa Clara Valley Transportation Authority

Subject: Supplement to September 2012 Paleontological Evaluation Report and Mitigation Plan, State Route 85 Express Lanes Project, Santa Clara County, CA (No. 0400001163/EA 4A7900)

Following completion of the Paleontological Evaluation Report and Mitigation Plan (PER-PMP) for this project in September 2012, a 1.1-mile long auxiliary lane was added to the project along northbound SR 85 between the existing South De Anza Boulevard on-ramp and Stevens Creek Boulevard off-ramp. This project change would widen the highway for the auxiliary lane and modify existing bridge abutments at two local street overcrossings. The work would occur within geologic deposits already identified and evaluated in the September 2012 PER-PMP and would not change any of the recommendations already presented in that report. The following summarizes the project changes, geologic conditions, and paleontological sensitivity at the auxiliary lane location.

The purpose of the auxiliary lane between the South De Anza Boulevard northbound on-ramp and Stevens Creek Boulevard northbound off-ramp is to improve traffic operations during peak periods. The existing pavement would be widened by up to 14 feet to the outside (northeast). To accommodate the auxiliary lane, sections of the existing abutments at the South Stelling Road and McClellan Road overcrossings adjacent to northbound SR 85 would be removed and replaced by new retaining walls to support the embankments behind them. No culvert extensions, sound wall modifications, or additional right-of-way would be required. The location of the work on SR 85 is shown in Exhibit 1 (next page), overlain on a geologic formations map.

The work area for the auxiliary lane was previously disturbed from construction of SR 85. The depth of excavation would be approximately 5 feet. As shown in Exhibit 1, the work area crosses two units: Pleistocene alluvial fan deposits (Qpaf) and Holocene stream channel deposits (Qhsc). Based on the Caltrans tripartite scale for paleontological sensitivity, Pleistocene alluvial fan deposits are ranked high sensitivity, and Holocene stream channel deposits are ranked low sensitivity (PER-PMP Table 3).

As stated in the PER-PMP, monitoring is recommended for areas with surface exposures of Pleistocene alluvial fan deposits if grading or other ground disturbance is proposed. If preconstruction survey or initial construction monitoring reveals that the sediments are too coarse or otherwise not conducive to fossil preservation, the principal paleontologist can suspend monitoring in such areas. Monitoring is not recommended for Holocene stream channel deposits because of their low sensitivity.

The recommendations outlined in the Paleontological Mitigation Plan section of the PER-PMP remain applicable to the revised project. No additional recommendations are needed.
Exhibit 1. The proposed auxiliary lane on northbound SR 85 (blue dashed line) would connect the existing South De Anza Boulevard northbound on-ramp and Stevens Creek Boulevard northbound off-ramp. The existing bridge abutments at the South Stelling Road and McClellan Road overcrossings adjacent to northbound SR 85 would be removed and replaced by new retaining walls to support the embankments behind them. With the exception of a slender band of Holocene stream channel deposits (Qhsc), the auxiliary lane and bridge abutment work areas are mapped as Pleistocene alluvial fan deposits (Qpaf). Adapted from PER/PMP Figure 3c. Source: Helley et al. 1994.