

APPENDIX A: AIR QUALITY AND GLOBAL CLIMATE CHANGE IMPACT AVOIDANCE AND MINIMIZATION FEATURES

AQ-IAMF#1: Fugitive Dust Emissions.

During construction, the contractor would employ the following measures to minimize fugitive dust emissions. The contractor would prepare a fugitive dust control plan for each distinct construction segment. At a minimum, the plan would describe how each measure would be employed and identify an individual responsible for ensuring implementation. At a minimum, the plan would address the following components unless alternative measures are approved by the applicable air quality management district.

- Cover all vehicles transported on public roads to limit visible dust emissions, and maintain at least 6 inches of freeboard space from the top of the container or truck bed.
- Clean all trucks and equipment before exiting the construction site using an appropriate cleaning station that does not allow runoff to leave the site or mud to be carried on tires off the site.
- Water exposed surfaces and unpaved roads at a minimum three times daily with adequate volume to result in wetting of the top 1 inch of soil but avoiding overland flow. Rain events may result in adequate wetting of top 1 inch of soil thereby alleviating the need to manually apply water.
- Limit vehicle travel speed on unpaved roads to 15 miles per hour (mph).
- Suspend any dust-generating activities when average wind speed exceeds 25 mph.
- Stabilize all disturbed areas, including storage piles that are not being used on a daily basis for construction purposes, by using water, a chemical stabilizer/suppressant, hydro mulch or by covering with a tarp or other suitable cover or vegetative ground cover, to control fugitive dust emissions effectively. In areas adjacent to organic farms, the Authority would use non-chemical means of dust suppression.
- Stabilize all on-site unpaved roads and offsite unpaved access roads, using water or a chemical stabilizer/suppressant, to effectively control fugitive dust emissions. In areas adjacent to organic farms, the Authority would use non-chemical means of dust suppression.
- Apply water or presoak all land clearing, grubbing, scraping, excavation, land leveling, grading, cut and fill, and demolition activities to control fugitive dust emissions effectively.
- For buildings up to six stories in height, wet all exterior surfaces of buildings during demolition.
- Limit or expeditiously remove the accumulation of mud or dirt from adjacent public streets at a minimum of once daily, using a vacuum type sweeper.
- Apply sufficient water or a chemical stabilizer/suppressant after the addition of materials to, or the removal of materials from, the surface or outdoor storage piles to control fugitive dust emissions effectively.

This action reduces construction related air quality emissions by requiring the preparation of a fugitive dust control plan. This plan identifies the minimum features that would be implemented during ground disturbing activities. Examples of these include covering all materials (truck beds) transported on public roads, watering exposed graded surfaces, limiting vehicle speed on the construction site, suspending operations during high wind events, stabilizing all disturbed graded areas, wetting of exterior surfaces of structures during demolition, and removing any accumulation of mud or dirt from adjacent public streets. These types of construction best management practices are proven methods of minimizing fugitive dust generation associated with ground disturbing and demolition construction activities. Each air district traversed by the HSR has adopted rules and/or regulations requiring dust control plans for construction activities. These

dust control plans are a part of each district's overall strategy for compliance with federal and state air quality standards.

AQ-IAMF#2: Selection of Coatings.

During construction, the contractor would use:

- Low-volatile organic compound (VOC) paint that contains less than 10 percent of VOC contents (VOC, 10%).
- Super-compliant or Clean Air paint that has a lower VOC content than that required by San Joaquin Valley Unified Air Pollution Control District Rule 4601, when available. If not available, the contractor would document lack of availability and obtain concurrence from the Authority on appropriate paint.

This commitment reduces overall construction emissions by limiting the type of paint to those containing volatile organic compound (VOC) of less than 10 percent (low) to be used during construction. Using paint that releases fewer organic compounds into the air after application is an air quality management measure effective in reducing construction emissions and achieving federal and state air quality standards.