Concerns regarding the Devil's Gate Sediment Removal Project

1. New science demands new assessment of health risks to 3,000 sensitive receptors nearby.

- a. <u>Air pollution is the "new tobacco"</u> health crisis, according to the World Health Organization pronounced on October 27, 2018. The primary component of air pollution is "Particulate Matter (PM)" of varying sizes (PM-10 micron, PM-2.5 micron, PM-0.1 micron). Vehicle exhaust and contact with roadways are the main sources of PM exposure unhealthy for children and elderly people.
- b. <u>Diesel Particulate Matter increases mortality</u>. Environmental health studies published over the past 20 years by researchers at USC, UCLA, UC Riverside and UC Davis demonstrate the short-and long-term negative health effects on communities living near diesel truck corridors and highways, specifically due to carcinogens released by diesel-powered vehicles. The most dangerous carcinogen is "ultrafine" particulate matter (PM_{0.1}), and diesel engines are a large source of ultrafine PM.
- c. <u>Old Equation</u>. The Health Risk Assessment (HRA) used in the Project's Air Quality Analysis (prepared by OB-1 Air Analyses, revised October, 2014) relies on an outdated equation for treating relative cancer risks that overlooked the effects on children. The HRA also used unverified emissions values for the 2010 trucks proposed for the Project (see below).

Parents' Request #1: Seek a new Health Risk Assessment using the updated equation by OEHHA (California's Office of Environmental Health Hazard Assessment) that better treats the impact of carcinogens discharged in diesel emissions on "sensitive receptors" and use field-tested values for diesel truck emissions as described below. The existing HRA is inadequate and dangerously misleading.

- The documented truck failures and non-compliance issues negate the use of "low-emissions" diesel dump trucks. Trucks appearing to comply with 2010 EPA emission standards are not actually "low emissions" vehicles.
 - a. The "Tier 7" diesel dump trucks described in the Project's FEIR <u>do not operate</u> according to the 2010 EPA Standards as assumed in the Air Quality Analysis. In July, 2018, the EPA announced a recall of 500,000 Cummins-WP diesel emissions control units that are used to bring pre-2010 trucks into compliance with the 2010 EPA standards. It will take years to track down the trucks containing the dysfunctional systems. California Air Resources Board (CARB) reported the failure of emissions control systems in retrofitted diesel trucks on October 31, 2018. See attached article.
 - b. <u>Actual truck emissions of NOx are elevated by 5-15x</u> over FEIR's Air Quality Analysis, when "in-the-field" operating conditions are used to calculate "grams per mile" of NOx output. The scientific publications consulted to reach this conclusion were authored by UC Riverside researchers.
 - c. <u>The truck volume is aggressive</u>: 300 trucks per day (Maintenance) and 425 trucks per day (Construction). The Air Quality Analysis did not address pollution from mobile sources along

the truck hauling routes, even where there is significant idling at the intersection of Oak Grove and Berkshire Place and on-ramps to the 210 freeway. The high volume of trucks and the poorly performing emissions control systems jeopardizes the 3,000 children along the truck route.

- d. <u>The amount of idling and low-speed transit</u> en route to the 210 freeway is significantly underestimated in the air quality analysis. Pollution outputs are highest when trucks are idling and traveling at 5-15 MPH Output is much heavier when the trucks are carrying 16-20 cubic yards of compact debris and going up inclines. The idling time estimate of 4 minutes per cycle is inaccurate. Guidance from SCAQMD suggests that idling and low-speed transit should be analyzed carefully for unaccounted pollution contributions.
- e. <u>CNG-powered dump trucks are operating</u> in Southern California and can be used in this project due to the cheaper fuel requirements and cleaner emissions profiles. Even if twenty CNG trucks are used, it would allow the Project to progress without the severe health risks to nearby children.

Parents' Request #2: Modify the sediment hauling schedule, the truck type, and the number of trucks on the road. Please put fewer trucks on the road. Using the diesel trucks as proposed in the Project will cause the Project to exceed the SCAQMD thresholds for NOx and endanger the 3,000 children along the truck hauling route. The actual "on-the-street" operating emissions values for the planned diesel trucks (which are much higher than assumed) should prompt an immediate rethinking of how much sediment can be safely removed in one day. More than 100 truck trips per day poses a public safety concern and should be further scrutinized. Converting 20% of the operating fleet to CNG-powered trucks would reduce the Project's harmful pollution.

- **3.** The published Project notices do not describe the compliance measures to protect the air quality and safety of nearby sensitive receptors.
 - a. The operating plan for Construction does not include using an on-site multi-axle scale to verify tonnage limits. Scale receipts should be required to match inbound and outbound loads.
 - b. Truck companies are not required to provide smog certificates for each truck; instead fleet averages are used. One offending truck can contribute a large portion of the pollution. See attached article.
 - c. Diesel particulate filter systems can be missing from diesel engines in spite of a fleet certification by the truck company; or the systems might be functioning improperly and there is no way to know. Smog checks for heavy duty diesel trucks are not required.
 - d. Environmental monitoring equipment is not required for measuring on-site emissions and city street transit emissions. The aggressive hauling route passes by a significant population of sensitive receptors and this immediate area will have elevated concentrations of carcinogens and pollutants.

Parents' Request #3: Require an independent contractor to ensure that truck hauling is 100% safe and legal on city streets and highways by using an on-site multi-axle scale to verify tonnage limits; that pollution thresholds at the site are not exceeded by using environmental monitors for all criteria pollutants (including "ultrafine" PM); that cameras document the extent of idling by queuing vehicles; that retrofitted diesel engines have emissions control systems that are properly maintained and the vehicles are smog-checked annually; that environmental monitors are installed and maintained at appropriate locations of "sensitive receptors" in 1-mile radius of the Project and along its low-speed transit corridors; and that the monitoring systems are in place before the April, 2019 debris removal begins.

- 4. The Traffic Impact Analysis (TIA) for the Oak Grove/Berkshire Place/210 ramps segment of the Project's hauling route is incomplete and outdated; the absence of any real analysis jeopardizes the public safety of this highly trafficked intersection.
 - a. The hauling route relies heavily on Oak Grove for vehicle entry and exit during the Project's removal phase. The diesel dump trucks using this route will idle significantly longer than anticipated, due to the amount of cars departing JPL and La Canada High School at various times of the day. This causes significantly more pollution for the Project's overall daily maximum of NOx.
 - b. The presence of a 4-way stop sign at the off- and on-ramps of the 210 on Berkshire Place means that exiting trucks will spend more time at low speed and idling before entering the 210 westbound on-ramp. At 50 trucks per hour, the NOx from trucks idling to turn onto the freeway will be significant.
 - c. The magnitude of parent, student and employee traffic along the traffic route between 3:00 and 5:30 PM is not documented, and this omission will make it difficult for trucks to enter the freeway and for people to get home.
 - d. The employee population at JPL in 2013 (time of the original traffic impact analysis) is different than the population in 2018.

Parents' Request #4: Obtain a new Traffic Impact Analysis that addresses the flow of entering and exiting trucks, especially along the segment of Oak Grove/Berkshire Place/210 ramps. The amount of idling (increased NOx output), the conflict with existing traffic at this location due to JPL, LCHS plus 2 other schools, and the need for synchronized turn lanes to accommodate the volume of trucks -- these important issues all point to the need for a new traffic analysis. The existing infrastructure poses severe hazard to those traveling in the area during the hauling season.

La Canada Flintridge Parents for Healthy Air November 1, 2018 Presented by Elizabeth Krider, Ph.D., Esther Kornfeld and Tamar Tujian

Taking a Communit	y-First Approac	h		
Berkshire Place Oak Grove Drive	Construction Period	Daily Time Interval	Hauling Hours/Year	
			East (Pasadena)	West (La Canada F.)
		7 AM - 10 AM	348	-
	Aug 12 – Nov 29	10 AM - 3:30 PM	580	
Ave Pasadena Gey	Jun 10 – Aug 9	7 AM - 3:30 PM	-	352
Varying haul routes a traffic impacts and b between the commun based on school sche	alance truck nities. Hours	traffic may change	O Albert Windsor Avenue Sol As U Woodbury R aga Abes U W M	a st Crosby St d ontana St a a

Proposed Hauling Schedule and Routes



Oak Grove / Berkshire Place / 210 ramps