

BAAQMD CEQA GUIDELINES

Risk and Hazard Screening Analysis Process

The District's CEQA community risk and hazards screening tools and tables are provided for lead agencies to consider in deciding whether there should be further environmental review of a project. The screening tables are intentionally conservative, such that if a project passes the initial screen, no additional review related to the impact is necessary. The screening tables are not intended to be used to assess actual risk for all projects. The screening tables are not intended to discourage infill development or affordable housing. If a project does not pass the initial screen, a more advanced screening analysis should be conducted. It is anticipated that most projects that do not pass the initial screen will pass the screen with more refined analysis. The screening tables will continue to be updated to reflect the best available data. Contact the District for additional guidance on the screening tables and for conducting a more advanced screening analysis.

The following steps outline the District's recommended screening analysis process. The referenced screening tools provide estimates for PM2.5 concentrations, cancer risk, chronic hazard risk, and acute hazard risk. For additional guidance on any of the steps refer to the Recommended Methods for Screening and Modeling Local Risk and Hazards report

(<http://www.baaqmd.gov/Divisions/Planning-and-Research/CEQA-GUIDELINES/Tools-and-Methodology.aspx>) or contact District staff.

The following tools and resources will be needed for the screening analysis:

- Google Earth, a free program: <http://www.google.com/earth/index.html>
- County specific Google Earth files that list and map all the stationary sources permitted by the District. The files are saved as .KMZ files for Google Earth:
<http://www.baaqmd.gov/Divisions/Planning-and-Research/CEQA-GUIDELINES/Tools-and-Methodology.aspx>
- Road and Highway Screening Tables created by the District:
<http://www.baaqmd.gov/Divisions/Planning-and-Research/CEQA-GUIDELINES/Tools-and-Methodology.aspx>
- Local road traffic count data from the California Environmental Health Tracking Program:
http://www.ehib.org/traffic_tool.jsp
- Highway annual average daily trip data from Caltrans:
<http://trafficcounts.dot.ca.gov/2009all/2009TrafficVolumes.htm>

Please note that risk reduction strategies may be considered and implemented at each step of the screening process. Risk reduction strategies include, but are not limited to:

- ✓ Setback/site design to reduce potential impacts to receptors through the use of parking lots, landscaping, or open space.
- ✓ Phase project to be built when the forecasted model year for roadways generates reduced impacts.
- ✓ Confirm that dry cleaners will be phasing out perc by project build out date.
- ✓ Install emission controls on back-up generators.

Contact District staff for additional risk reduction strategies as needed.

District staff will continue to update and expand screening tables and technical support tools. To report any errors or corrections in the District's tools, please contact District staff.

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BAAQMD Risk and Hazard Screening Analysis Process:

1. Identify emission sources within 1,000 feet of project's fence line.

Permitted Sources:

- Install Google Earth, and then download the Google Earth permitted source map files from the District's website.
- The Google Earth files list and map the stationary sources permitted by the District and provide conservative screening values for PM2.5, cancer risk and hazard index.
- Input the project's address into the search bar. Use the ruler function to identify and measure the distance between the project's fence line and permitted sources within 1,000 feet.

Highways and Major Roadways:

- Using Google Earth, identify the freeways and major roadways near the project.
- Major roadways are defined as having at least 10,000 average annual daily traffic (AADT). Roadway traffic count data is available from the local congestion management authority.
- Traffic count data may also be found on the California Environmental Health Tracking Program website, http://www.ehib.org/traffic_tool.jsp by entering the project's latitude and longitude coordinates.

2. Conduct initial conservative screening .

Permitted Sources:

- Click on the Google Earth points to see estimated PM2.5, cancer risk , and hazard index values for the identified permitted sources and compare the estimates against the CEQA single source thresholds.
- Verify data with District staff for permitted sources that list no information or have a cancer risk of over 10 in a million.

Highways and Major Roadways:

- Download the Road and Highway Screening Tables from the District's website. The roadway screening tables are modeled using roadways' highest AADT value .
- Look-up PM2.5, cancer risk, and hazard index values for highways and major roadways based on the distance of the roadways from the project and whether the project is east/west or north/south of the roadway.

Cumulative Impacts:

- Sum the individual values for all the sources within 1,000 feet of the project and compare the total against the cumulative thresholds.

3. Conduct advanced screening for more refined estimates.

Permitted Sources:

- Contact District staff for refined estimates for sources above the thresholds. The District has site-specific risk assessments for many sources or can provide tips for scaling concentrations by distance.

Highways and Major Roadways:

- Scale the roadway risk and hazard values to the actual AADT near the project. Identify actual AADT by finding the nearest postmile to the project at: <http://traffic-counts.dot.ca.gov/2009all/2009TrafficVolumes.htm>
- Divide the postmile AADT by the AADT in the screening table. Multiply that value with the risk and hazard level in the screening table for the actual level at the postmile: (Postmile AADT/Screening AADT) x Screening Value = Postmile Value.
- This method applies to scaling PM2.5, cancer risk, and hazard index for highways and roadways.
- To refine estimates based on the exact distance of the roadway to the project see Section 3.1.2 in the *Recommended Methods for Screening and Modeling Local Risk and Hazards* report, <http://www.baaqmd.gov/Divisions/Planning-and-Research/CEQA-GUIDELINES/Tools-and-Methodology.aspx>

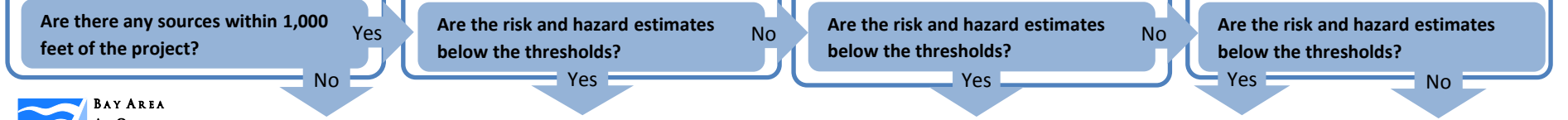
4. Conduct refined modeling analysis.

Permitted Sources:

- If the results of the refined screening exceed the thresholds, the project may opt to conduct site-specific air modeling analysis. Refer to the District's *Recommended Methods for Screening and Modeling Local Risk and Hazards* report for recommended modeling approach.
- Contact District staff for information regarding modeling inputs for specific permitted sources and recommended exposure parameters. To receive copies of specific permit files, complete a public records request on the District's website.

Highways and Major Roadways:

- Roadway modeling may be further refined by using local meteorology and emission rates and highway estimates may incorporate site-specific truck fractions and AADT.
- Refer to the District's *Recommended Methods for Screening and Modeling Local Risk and Hazards* report for recommended modeling approach and exposure parameters.



Project can assume no significant impact for risk and hazards. No further analysis needed.

Implement risk reduction strategies.