TABLE 4.5-31 CONTRA COSTA POWER PLANT CONCENTRATION ESTIMATES

Concentrations in Micrograms per Cubic Meter (µg/m<sup>3</sup>) Difference Power Plant Effect/Total Concentration<sup>b</sup> Difference between 2005 2005 between 1999 **Cumulative** Cumulative 1999 Analytical Analytical Analytical 1999 Maximum **Averaging** State **National Delta Region** Analytical Maximum **Pollutant** Period Standard Standard **Background** Baseline Maximum Maximum<sup>d</sup> and Baseline and Baseline 0 Carbon 1 hour 23,000 40,000 6.517 81.1/6.598 81.1/6.598 81.1/6.804 0 Monoxide 8 hours 10,000 10,000 3,297 56.7/3,354 56.7/3,354 56.7/3,498 0 0 Nitrogen 470 NA 132 135.4/267 135.4/267 17.7/150 0 -117.71 hour<sup>c</sup> Dioxide 100 31 -8.1 annual NA 11.8/43 24.6/56 3.7/35 12.8 87 0 0 Sulfur Dioxide 1 hour 655 NA 0.6/880.6/880.6/8824 hours 105 365 0.2/240.2/240.2/240 24 0.1 0.1 annual NA 80 3 0.2/3.20.3/3.30.3/3.3Particulate 24 hours 50 150 60 2.9/**62.9** 2.9/62.9 2.9/62.9 0 0 Matter annual 30 50 22 1.3/23.3 2.6/24.6 2.3/24.3 1.3 (PM-10)Particulate 24 hours NA 65 ND 2.9/2.9 2.9/2.9 2.9/2.9 0 0 Matter annual NA 15 ND 1.3/ND 2.6/ND 2.3/ND 1.3 (PM-2.5)

NA: Not applicable

ND: Not determined; PM-2.5 ambient monitoring has only recently begun in the Bay Area.

Values shown in bold type exceed a corresponding ambient air quality standard.

<sup>&</sup>lt;sup>a</sup> Maximum contributions have been combined from the two units. No offsite location would reach these levels. Background concentrations (except for annual averages) represent the average of the 2nd highest values recorded each year from 1994 to 1996 at the Bethel Island monitoring station.

b In these columns, the number on the left shows the contributions of the power plants; the number on the right is the total contribution, including the Delta Region background.

Maximum NO2 concentrations from the power plant were calculated using the Ozone Limiting Method (Cole and Summerhays, 1979) based on a worst-case background ozone concentration of 133 micrograms per cubic meter.

d The 2005 Cumulative Analytical Maximum assumes new owners will have to comply with a modified BAAQMD Regulation 9, Rule 11 emission rate schedule similar to the existing schedule.