Summary of Air Quality Monitoring in Wilmington
May 2001 - December 2001

Wilmington Air Monitoring Study

- Air monitoring is being conducted in Wilmington as part of the Children’s Environmental Health Protection Program. The purpose of this program is to assess whether the existing air monitoring network and air quality standards adequately protect children.
- More than 50 air pollutants are being monitored between May 2001 and June 2002 at Wilmington Park Elementary School. (Figure 1)
- Four air pollutants are being monitored between November 2001 and May 2002 at Hawaiian Avenue Elementary School. (Figure 1)
- Monitoring data are still being collected and analyzed. The results presented here represent a preliminary analysis of only a portion of the data that will be collected during this study.

Preliminary Findings Through December 2001

PM10 Monitoring
- The 24-hour federal PM10 standard (150 ug/m3) was not exceeded at either of the Wilmington monitoring sites. (Figure 2)
- The 24-hour state PM10 standard (50 ug/m3) was exceeded on several occasions at both the Wilmington Park Elementary School and the Hawaiian Avenue Elementary School. Most urban areas in California exceed the state PM10 standard. (Figure 2)
- The PM10 levels measured at Wilmington Park Elementary School and the Hawaiian Avenue Elementary School are very similar. (Figure 2)

Ozone Monitoring
- The federal one-hour ozone standard (0.12 ppm) has not been exceeded at Wilmington Park Elementary School thus far in this monitoring study. The greater Los Angeles area does not meet the federal ozone standard.
- The state one-hour ozone standard (0.09 ppm) has not been exceeded at Wilmington Park Elementary School thus far in this monitoring study. Compared to the Los Angeles area, ozone levels in the Wilmington area are very low. Some parts of the South Coast Air Basin exceed the state ozone standard over fifty days per year. Ozone levels were not monitored at Hawaiian Avenue Elementary School.

Toxic Air Pollutant Monitoring
- In general, the levels of major toxic air pollutants measured at Wilmington Park Elementary School are comparable to what was observed in Wilmington during the MATES II study in 1999.
- The average levels of some of the more common toxic air pollutants measured at Wilmington Park School are consistently lower than the average levels measured at the three routine toxic air pollutant monitoring sites in the Los Angeles County. (Figure 3)
- Except for one pollutant (1,3-butadiene), the average levels of some of the more common toxic air pollutants measured at Wilmington Park School are also lower than the overall average levels of toxic air contaminants measured at the Air Resources Board’s 22 routine toxic air pollutant monitoring sites which are located in major urban areas in California. (Figure 4)
1. Wilmington Park Elementary School (Mahar Charity House) *(Primary Site)*
2. Hawaiian Avenue Elementary School *(Secondary Site)*
Figure 2: Particulate Matter (PM10) in Wilmington

Levels (ug/m3)

Federal Standard
150 ug/m3

State Standard
50 ug/m3

Wilmington Park Elementary

Hawaiian Elementary
Figure 3: Toxic Air Pollutant Levels at Wilmington Compared to Los Angeles County
(July - December* Averages of Three Routine Monitoring Sites)

Most data below detectable levels

*Acetaldehyde and formaldehyde are based on May through December.
Figure 4: Toxic Air Pollutant Levels at Wilmington Compared to Average Levels in Urban California
(July - December* Averages of Twenty-two Routine Monitoring Sites)

Percent of Average Urban California Level

1.3-Butadiene: 128%
Acetaldehyde: 75%
Benzene: 74%
Formaldehyde: 69%
Hexavalent Chromium: 43%
Methylene Chloride: 75%
Perchloroethylene: 92%
Toluene: 92%

*Acetaldehyde and formaldehyde are based on May through December.

Most data below detectable levels