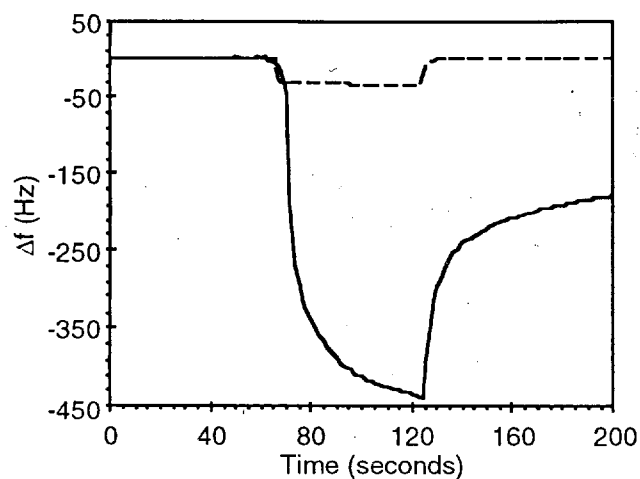**Figure 1**

Figure 1: Exposure of a quartz crystal microbalance coated with ES-DBSA (1:0.5)/CB (80:20) to 1% butanol (dashed line) in air and to 1% butyl amine in air (solid line). A frequency shift of 441 Hz corresponds to a mass loading of 272 ng cm^{-2} into the polymer film.
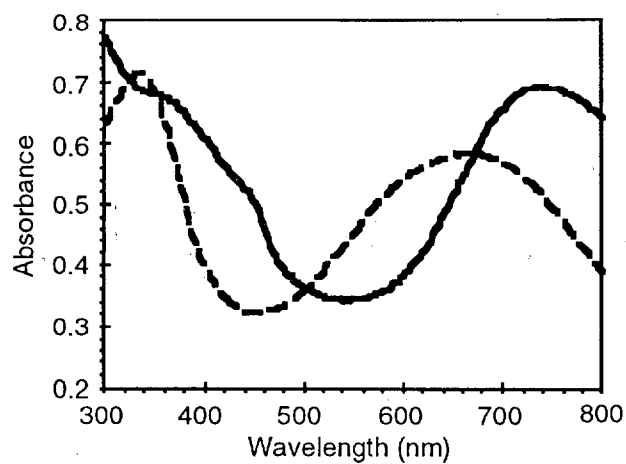
Figure 2

Figure 2: The solid line is the UV-Vis spectrum of EM-DBSA (1:0.5)/CB (80:20) on a glass slide in air. The dashed line is the UV-Vis spectrum obtained after injection of butylamine at 1% of its vapor pressure.
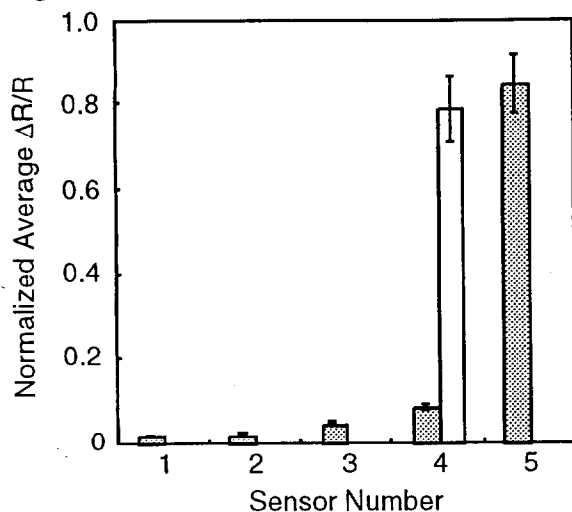
Figure 3

Figure 3: Pattern of relative differential resistance signals arising from exposure of an emeraldine salt/carbon black vapor sensor array to aniline (shaded) and butyl amine. Each analyte was at 5% of its vapor pressure during the exposure to the detectors. The values are reported as the average of 5 copies of each detector to one exposure of the analyte. The detector responses for aniline were normalized acoss the array using the maximum raw data response from sensor number 5 ($\Delta R/R$ = 19.26), while for butyl amine the responses were normalized across the array using the maximum raw data response from sensor number 4 ($\Delta R/R$ = 86,340).