

Table 1 SURVEY OF REGIONAL AIR QUALITY MODELS SUITABLE FOR INTERMEDIATE RANGE APPLICATION

| No Vertical Resolution | Moderate Vertical Resolution | Sufficient Vertical Resolution |
|--|--|---|
| Uniform distribution | Ground level estimates distinct from mixed layer; or Gaussian distribution in vertical (reflections or no reflections); or Gaussian distributions modified by dry deposition; or Other analytic expression for vertical distribution | Vertical diffusion equation integrated; or Variable K_z profiles; or Multiple-layer models |
| <p>AES/LRT^{2,4,7} (Voldner et al., 1980) CAPITA/MCARLO^{3,12} (Patteraon et al., 1980) CCIW/LDAPM^{2,8} (McMahon, 1976) DMI/LRPDM^{1,10} (Prahm and Christenaen, 1977) ERT/ATM^{1,4,7} (Rao et al., 1976) IAP/LRT^{1,4,7} (Szepesi, 1978) NIAR/RTM^{1,4,7} (Eliassen and Saltbones, 1975) OME/LRT^{2,5,6} (Venketram et al., 1980) SCAR/LRTM^{1,4} (Nordlund, 1975)</p> | <p>ARL/ATAD^{3,4,6} (Heffter, 1980) CERL/LTSDM^{2,6,8} (Fisher, 1978) ERT/MESOPLUME^{1,4,6} (Berkley and Bass, 1979a) ERT/MESOPUFF^{1,4,6} (Berkley and Bass, 1979b) MEP/LRT^{2,5,6} (Weisman, 1980) PNL/LRT^{3,4,6} (Wendell et al., 1976) PNL/RPTM^{2,4,6} (Powell et al., 1979) PNL/STRAM^{1,4,6} (Halea et al., 1977) RI/MTDIS^{1,4,6} (Wang et al., 1980)</p> | <p>ANL/STRAP^{2,5,6} (Sheih, 1977) ANL/ASTRAP^{2,5,6} (Shannon, 1979) ARL/MTDF^{1,4,6} (Draxler, 1979) BNL/AIRSOX^{1,4,6} (Meyera et al., 1979) EPA/RAQSM^{1,11,13} (Lamb, 1980) DM/RADM^{1,4,6} (Runchal, 1980) DU-NCAR-BNL/LAMPS^{1,11,14} (Kreitzberg and Leach, 1978) ERT/SURAD^{1,11} (Lavery et al., 1978) ERT/SULFASD^{1,11} (Egan et al., 1976)</p> |