

GREENGUARD Emission Criteria

For use with GREENGUARD Certification ProgramSM for Low Emitting Products

Children & Schools Program

Individual VOCs ¹	≤1/100 TLV and ≤½ CA chronic REL
Formaldehyde ²	≤0.0135 ppm/13.5 ppb
Total VOCs ³	≤0.22 mg/m ³
Total Aldehydes ⁴	≤0.043 ppm/43 ppb
Total Phthalates ⁵	≤0.01 mg/m ³
Total Particles ⁶ (≤ 10µm)	≤0.02 mg/m ³

¹Any VOC not listed must produce an air concentration level no greater than 1/100 the Threshold Limit Value (TLV) industrial work place standard (Reference: American Conference of Government Industrial Hygienists, 6500 Glenway, Building D-7, Cincinnati, Ohio 45211-4438) and/or no greater than 1/2 the CA Chronic Reference Exposure Level (CREL) (http://www.oehha.ca.gov/air/chronic_rels/AllChrels.html - (CRELs) Adopted by the State of California Office of Environmental Health Hazard Assessment (OEHHA), February 2005).

²Formaldehyde criteria established so that emission levels reach 0.014 ppm (13.5 ppb) within 14 days of installation (meeting CA 1350 requirements).

³Defined to be the total response of measured VOCs falling within the C₆ – C₁₆ range, with responses calibrated to a toluene surrogate.

⁴Defined to be the total response of a specific target list of aldehydes (2-butenal; acetaldehyde; benzaldehyde; 2,5-dimethylbenzaldehyde, 2-methylbenzaldehyde; 3-and/or 4-methylbenzaldehyde; butanal; 3-methylbutanal; formaldehyde; hexanal; pentanal; propanal), with each individually calibrated to a compound specific standard.

⁵Defined to be the total response of a specific target list of phthalates including dibutyl (DBP), diethylhexyl (DEHD), diethyl (DEP), butylbenzyl (BBP), di-octyl (DOP), and dimethyl (DMP) phthalates (conducted using a modified phthalate specific analytical method, OSHA 104).

⁶Particles applicable to fibrous, particle-releasing products with exposed surface area in air streams (a forced air test with specific test method).

GREENGUARD Certification affirms that a product's emissions fall within the limits selected by GREENGUARD from reputable third-party risk based criteria, as identified above. GREENGUARD program testing is conducted consistent with a defined protocol and does not measure emissions under usage conditions other than those defined in the protocol and does not address potential environmental impact other than chemical emissions.