

Regulation DD-27.0: Discharge of Waste Gases, Fumes and Dusts to the Atmosphere

- 27.1 Industrial manufacturing process and some commercial establishments generate waste gases, fumes and dusts which are collected and discharged to the atmosphere through vertical chimneys or vents. Dubai Local Order No. 61 of 1991 requires all occupiers to discharge such waste through chimneys. This guideline sets out the information required for the design and installation of chimneys necessary to comply with the Local Order.
- 27.2 In any industry or commercial establishment airborne wastes shall be collected by the Best Practicable Means and discharged to atmosphere.
- 27.3 All waste discharges shall have an unimpeded vertical discharge. Any weather protection cowls shall be designed so that they do not obstruct the vertical free flow of gases, fumes or dust. Installation of conical weather caps and the like shall be avoided. (Refer Appendix 1).
- 27.4 All chimneys shall have a minimum height of 3 meters above the highest point of any structure/building heights. For large volumes or significant emissions or where there is residential or public use land within 100 meters, high chimneys may be necessary.
- 27.5 All gaseous waste, fumes or dust discharges shall have a minimum exit velocity of at least 8 m/sec. Moisture must not condense in the chimney during the colder months. Chimneys may have to be insulated to avoid acid condensation.
- 27.6 New chimneys should not be constructed without the approval of the EHS-Trakhees-PCFC.
- 27.7 Any source emitting combustion gases and particles more than 100 kgs per day of nitrogen oxides, sulfur dioxide or particles shall determine the chimney height on the basis of dispersion calculation to satisfy the air quality objective at ground level.
- 27.8 Any source emitting toxic and hazardous substances as classified shall be provided with control measures.
- 27.9 In built up areas such as downtown, emission sources must be located away from the public access areas and clear of any air conditioning intakes, vents or open able windows.