

## CL-T

### Chemical air cleaners



#### Applications

CL - T air cleaner (heavy-duty cleaner) is designed for critical conditions/intake air applications. Halton Chem air cleaners are designed for purification of intake and circulation air in air-conditioning systems installed in facilities with major odour problems and high corrosion concentrations such as electrical and instrument facilities, IT control rooms and computer centres, as well as electronic equipment facilities. The CL - T air cleaner is also used in particularly demanding applications, such as sewage treatment plants.

#### Construction

CL - T air cleaner is filled with chemical filtering material through the openings in the top part and drained through the draining doors in the bottom part. No separate plastic filter cells are needed.

#### Quality and environment

Operations are guided by the ISO 9001:2001 quality certificate and the ISO 14001 environmental certificate.

#### Technical data

##### Dimensioning

Filtration efficiency	99.9 %
Contact time Dwell time	1.2 - 3 s

##### Filtering material

E.g. CL ALOX 6 or CL CARB 9 cf. chemical filters

##### Particle filters

Prefilter	e.g. CL-KS 66 F5-48
Final filter	e.g. CL-SLP 66 F9-100
Differential pressure gage	Magnehelic 2000 (Accessory)

##### Air cleaner frame

Material	acid-resistant (or galvanized) steel flange
Connection type	flange

## Operating and service instructions for

### Chemical air cleaner CL - T

Heavy-duty air cleaner CL - T comprises two 30 cm thick chemical filter zones. Depending on the impurities, the filtering material is either CL ALOX 6 or CL CARB 9.

Each filter zone is provided with a top opening for filling and a drainage door in the bottom part.

#### Refill

Procedure:

- make sure you have a sufficient amount of filtering material available
- make sure the drainage door is properly in place and tightly closed
- open the refill opening
- fill the filter zone to the top of the refill opening
- if required, wear a respirator mask or ensure sufficient ventilation in the room
- close the filling door tightly
- make sure that prefilters and final filters are in place
- make sure the access doors are tight
- start the fan
- record the refill

#### Replacement of filtering material

The replacement of the chemical filtering material is determined on the basis of monitoring results. The filter stages shall be replaced at the same time based on the life cycle analysis of the materials.

Procedure:

- find out where you can collect the used material and how it can be taken away
- stop the fan
- open the drainage door

- using the required accessories, remove the filtering material completely
- if required, wear a respirator mask or ensure sufficient ventilation in the room
- inspect the air cleaner visually
- close the drainage doors tightly
- fill the air cleaner with new filtering material (cf. refill)

#### Sampling

The deterioration of chemical filtering material is monitored by means of regular sampling (e.g. at intervals of 6 months). The sample is analysed and the results used to determine the replacement time.

Procedure:

- stop the fan
- open the refill opening of the last filter zone
- take a sample (approximately 100 g) from the centre of the material
- enclose the sample in a sample bag
- close the filling door tightly
- start the fan
- fill in the sampling form
- send the sample and the form to Halton Chem for analysis. The analysis results will be sent to you within ca 2 weeks after the sample has been received.

#### Prefilters and final filters

Prefilters and final filters connected to or integrated into the air cleaner should be monitored and serviced in the same way as all other particle filters in airconditioning systems, usually on the basis of differential pressure measurements.