

# Construction details

## Open cooling towers

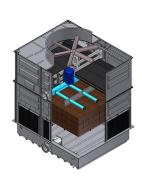
### Construction details

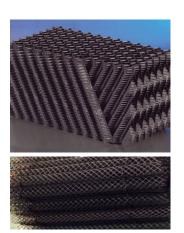
#### 1. Material options

- Structural panels and fan deck are made from hand-laid heavy duty <u>fibreglass reinforced polyester (FRP)</u>, with hot-dip galvanised fill and mechanical supports.
- Option: Stainless steel type 304 or 316 fill and mechanical supports for added corrosion resistance.
- Cold water basin: Mould formed, hand laid, heavy-duty fibreglass reinforced polyester (FRP) with smooth internal finish.
- Option: Tower without cold water basin for on-site assembly on concrete tank.

#### 2. Heat transfer media

- Our heat transfer media is cross fluted fill design in easy to handle, lift and remove blocks. Standard offering is a flame-retardant polyvinyl chloride (PVC) material, with sheet spacing of 12mm or 19 mm for clear water applications
- Choose high-density polyethylene (HDPE) tube fill with 65mm spacing for dirty water applications.
- For operation above 55°C, try our optional high temperature fill, usable with intake water up to 65°C.







#### 3. Air movement system

- Direct-drive models are fitted with aerofoil blade fans with an aluminium hub and injection-moulded glass reinforced composite blades.
  - Larger units use **V-belt drives** with aerodynamically designed, extruded aluminium blade fans. This drive system consists of heavy duty bearings, steel shaft and pulleys.
- Our high efficiency drift eliminators come in UV-resistant plastic, which will not rot, decay or decompose. These are assembled in easily handled and removable sections, for optimal internal access and maintenance.
- Easy removable UV-resistant PVC air inlet louvres at air inlet, block sunlight to prevent biological growth in tower, filter air and stop water splash-out.



These consist of:

- Spray branches with non-clog plastic nozzles secured by rubber grommets. Tool free branch removal for easy inspection and flushing.
- Flanged inlet and outlet connections.
- Easy accessible cold water basin, including anti-vortexing strainer, make up and overflow connection.

**Interested in the FCT cooling tower?** Contact your local <u>BAC</u> representative.



