

### PRODUCT SPECIFICATION

The louver is to be manufactured by Brentwood Industries and shall meet the following specifications:

1. Scope:

ACCU-PAC CL-100 is a cellular type louver designed to minimize splash-out of falling water from counterflow cooling towers, reduce light transmission into the tower and reduce sound transmission out of the tower at minimal airside pressure loss.

2. Material of Construction:

A. General

The louver modules shall be fabricated from rigid, corrugated PVC or HPVC sheets and UV protected. The modules shall be resistant to rot, fungi, bacteria and inorganic/organic acids and alkalies as commonly found in cooling towers.

B. PVC SHEETS

The PVC sheet shall be prime, rigid PVC conforming to commercial standard ASTM D1784:12344B to 12454B with the following properties:

| PROPERTIES          | ASTM TEST METHOD | UNIT          |      | VALUE<br>(min. unless otherwise noted) |       |
|---------------------|------------------|---------------|------|--|-------|
|                     |                  | IP            | SI   | IP                                     | SI    |
| Specific Gravity    | D792             | Dimensionless |      | 1.45 max.                              |       |
| Tensile Strength    | D638/D882        | psi           | mPa  | 6,000                                  | 41.4  |
| Flexural Modulus    | D790             | psi           | mPa  | 425,000                                | 2931  |
| Flexural Strength   | D790             | psi           | mPa  | 11,000                                 | 75.9  |
| Elastic Modulus     | D638/D882        | psi           | mPa  | 360,000                                | 2,483 |
| Izod Impact         | D256             | ft-lbs/in     | j/cm | 1.0                                    | 0.534 |
| Impact Resistance   | D4226            | in-lbs/mil    | j/mm | 1.2                                    | 5.34  |
| Heat Deflection     | D648             | °F            | °C   | 160                                    | 71    |
| Flame Spread Rating | E-84             | Dimensionless |      | less than 20                           |       |
| Flammability        | D635             |               |      | Self-extinguishing<br><5 sec.          |       |

C. Chemical Resistance

|                                   |           |              |
|-----------------------------------|-----------|--------------|
| Resistance to Grease Fats, & Oils | Excellent | ASTM D722-45 |
| Resistance to Acids               | Excellent | ASTM D543    |
| Resistance to Alkalies            | Excellent | ASTM D543    |

### D. Temperature Resistance

| Material of Construction | Max. Continuous Operating Temperature |    | Max. Peak Temp.* |    |
|--------------------------|---------------------------------------|----|------------------|----|
|                          | F                                     | C  | F                | C  |
| PVC                      | 140                                   | 60 | 155              | 68 |
| HPVC                     | 150                                   | 66 | 165              | 74 |

\* Duration of peak temperatures not to exceed 2 hours

The PVC sheets shall be of uniform thickness and free from holes, air bubbles, foreign matter, undispersed raw material or other manufacturing defects, which may adversely affect their performance.

### 3. Module Physical Data

| Specifications    | Data  |
|-------------------|---|
| Material          | Rigid PVC                                       |
| Module Width      | 12" (305mm)                                     |
| Module length     | 12" to 120" (305mm to 3050mm)                   |
| Light Reduction   | 70:1  |
| Sound Attenuation | Up to 3 dB                                      |
| Weight            | 1.0 lb/ft <sup>2</sup> (4.9 kg/m <sup>2</sup> ) |
| Sheet gauge       | 15 mil (0.38mm)                                 |

### 4. Pressure Loss

