Fancoils with air sterilization device
AirLeaf UV-C benefits

• UV-C germicidal irradiation (ultraviolet -C) is an effective method to inactivate molds, bacteria and viruses.
• It prevents the spread of infectious diseases caused by bacteria and viruses.
• It keeps the battery, the condensate drain pan, the plenums and the channels constantly clean, reducing or eliminating the cleaning processes and the use of harmful chemicals and disinfectants.
• It does not produce ozone or secondary contaminants, it does not harm the people who occupy the building or the equipment.
• Installs quickly, easily and safely.

The functioning principles

UV rays are divided into three bands: UV-A (long waves), UV-B (medium waves) and UV-C (short waves).

UV-C rays include the largest portion of the entire UV spectrum and at 260 nm have a strong germicidal effect because they alter the molecular structure of the DNA.

Molecular modification of such structure damages DNA to such an extent that the transcription process, which is essential for DNA replication and cell cleavage, can no longer take place. A cell damaged in this way will eventually die.

In principle: the simpler the structure of a microorganism, the easier it will be to inactivate it through UV radiation. Therefore it is easier to destroy viruses, bacteria and bacterial spores than complex microorganisms such as yeasts and vegetative mushroom cells (eukaryotic cells).

UV-C is the germicidal tool that has been used for 65 years to kill microbes in hospitals, laboratories, in water treatment, in the production of drinks, in the transformation of food products, in the pharmaceutical sector and others.

Thanks to the improvements made by technology, UV-C can now be used to destroy the contagious diseases that circulate in the air.
Assembly sequence in fancoils already installed

1. Components to be installed: UV-C lamp, lamp fixing bracket to the fancoil, power supply, connection cables kit to the AirLeaf control board.

2. The UV-C lamp must be installed in the appropriate fixing bracket.

3. Disconnect the power supply to the fancoil. On the opposite side to the hydraulic connections, remove the side, top cover, delivery grille and protection cover of the unit control board.

4. Fasten the UV-C lamp power supply to the protective cover of the AirLeaf control board with a special double-sided tape.

5. Place the power cable kit to the lamp. Connect the cable kit to the power supply of the UV-C lamp and to the EV1 terminal on the AirLeaf control card.

6. Connect the lamp to the cable kit clamp. Place the lamp fixing bracket in the AirLeaf, mount the delivery grille, cover and side. Reconnect the power supply to the AirLeaf.