

REVAMPING & SPARE PARTS

WATER COOLING TOWERS



> REVAMPING AND UPGRADING

ILMED IMPIANTI, besides the new Cooling Towers installation and realization, performs the revamping of the existing Cooling Towers, through the “turn-key” formula. This activity includes:

1. INSPECTION OF THE TOWER

Before starting any activity, an accurate inspection of the cooling tower to be revamped must be carried out.

The inspection will check:

- ✓ the internal and external structure
- ✓ the gear motor/fan system
- ✓ the water distribution system
- ✓ the filling and drift eliminator
- ✓ that the project documents correspond to the actual situation

2. SURVEY OF CURRENT HEAT LOADS

When possible, a performance test should be carried out to gain an accurate overview of the current situation of the heat loads. The new heating structure in which the tower will operate once the revamping has been completed will be designed based on the data obtained and on our Client's needs.

3. STUDY AND ANALYSIS OF THE ORIGINAL PROJECT FEATURES

A careful analysis of the original cooling tower features is performed to identify any critical points in the thermal system and to intervene with the best solution.

With the assistance of specific specialist software, our technicians are then able to produce an accurate overview of the current situation.

4. STUDY OF THERMODYNAMIC UPGRADING AND ENERGY SAVING SCHEMES

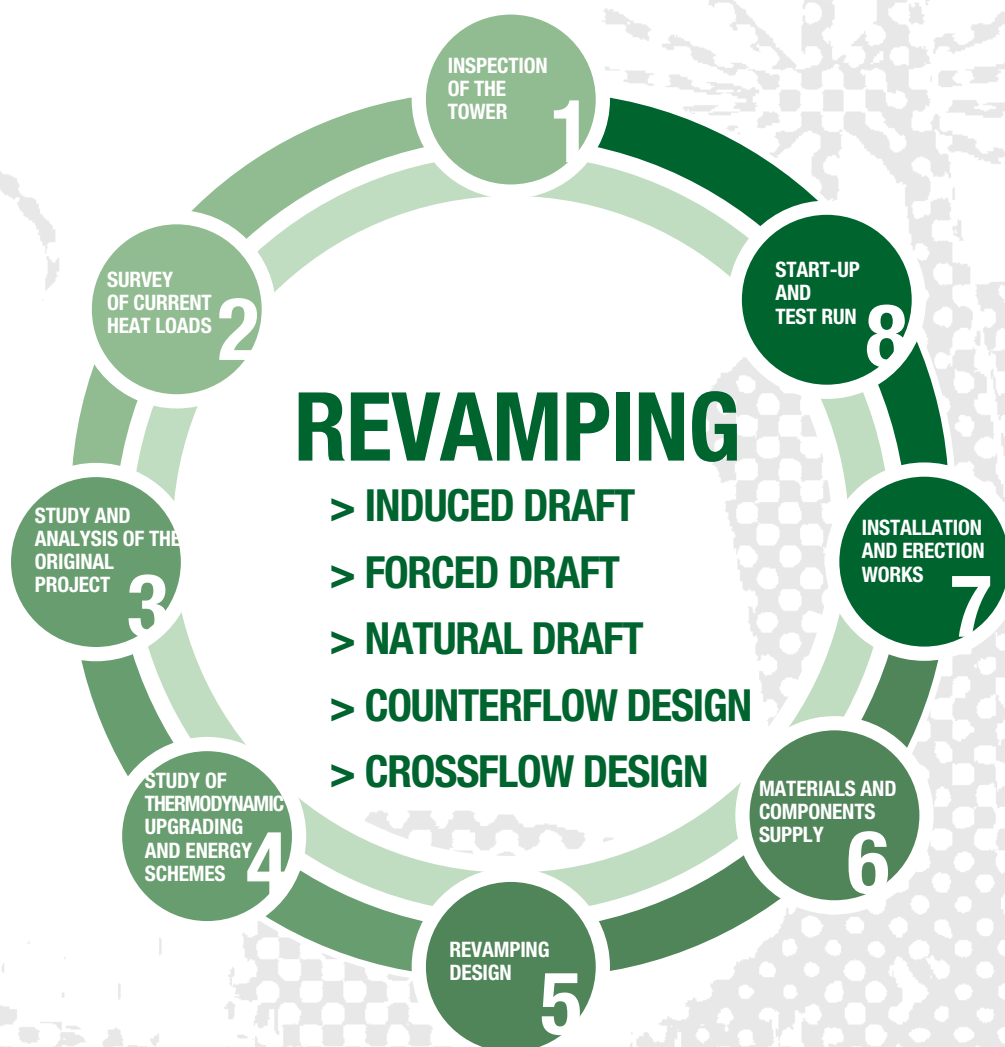
Once the new heat capacity to be achieved have been established and the works to be undertaken have been defined, our design departments can choose the most suitable components which have excellent energy saving features in addition to satisfying the design's needs.

5. REVAMPING DESIGN

At this stage, our designers will draft all the detail and assembly drawings erection assemblies with technical specifications.



Thanks to our long and great experience in Cooling Towers designing and manufacturing, we are in a position to revamp and upgrade Field Erected and Factory Assembled Cooling Towers, produced both by ILMED IMPIANTI and by other manufacturers, of the followings typologies:





6. MATERIALS AND COMPONENTS SUPPLY

Contrary to many cooling tower manufacturers, ILMED IMPIANTI produces and installs the main cooling tower components such as fans, filling and nozzles. These components, which are fundamental to achieving the performance desired, are the sole property of ILMED IMPIANTI.

For other important elements such as electric motor, speed reducers and driving shafts, ILMED IMPIANTI uses specialised primary manufacturers.

7. INSTALLATION AND ERECTION WORKS

Erection works are carried out by Specialised Operators who are experts in cooling towers and their components. Assistance from ILMED IMPIANTI Supervisor Technicians is guaranteed during these works. The typical sequence of installation works are:

- ✓ Implementing safety measures on the tower to be revamped
- ✓ Disassembling the gear motor/fan system
- ✓ Disassembling the drift eliminators and water distribution system
- ✓ Disassembling the filling
- ✓ Cleaning the basin and removing waste
- ✓ Assembling the new water distribution system
- ✓ Assembling the new filling
- ✓ Assembling the new gear motor/fan system
- ✓ Assembling the new drift eliminators
- ✓ Assistance for start-up

All the process phases following a careful risk assessment and in accordance with current safety regulations.

8. START-UP AND TEST RUN

Following start-up, ILMED IMPIANTI will perform a TEST RUN if necessary to confirm that the required objectives are reached and will issue a final report with a performance guarantee.



> COMPONENTS SUPPLY

ILMED IMPIANTI **MANUFACTURES** and supplies main components for every type of Water Cooling Towers as:

- ✓ FILM FILLING – FILMED 15, FILMED 20 - PVC
- ✓ SPLASH FILLING - TRUST - PP
- ✓ SPLASH FILLING – SPLASH GRID – Stacked or Hanged up - PP
- ✓ NOZZLES - THREE-STAGES SPRAYING NOZZLES - PP
- ✓ FAN – FAN MADE OF LIGHT ALLOY OR GRP – DIA From 400mm to 11mts

All components mentioned here above are designed by ILMED IMPIANTI and marked green with its logo.

Moreover, ILMED IMPIANTI supplies a complete range of spare parts, perfectly interchangeable to original ones, for every type of cooling towers.

- | | |
|--|--|
| ✓ STANDARD FILM filling system - PVC/PP mat | ✓ Complete ventilation unit |
| ✓ SPLASH STANDARD filling system - PVC/PP mat | ✓ Complete water distribution system |
| ✓ LAMELLAR type drift eliminator - PVC/PP mat | ✓ Louvers or air intake grilles |
| ✓ CELLULAR type drift eliminator - PVC/PP mat | ✓ Control and automation of control panels |
| ✓ Nozzles made of various materials | ✓ Vibraswitches |
| ✓ Electric motors | ✓ Fan stacks made of FRP / Carbon Steel |
| ✓ Speed reducers | ✓ Basin anti-splashing systems |
| ✓ Drive shafts | ✓ Low noise systems |
| ✓ Lamellar joints for drive shafts | ✓ Various components |
| ✓ Air/water exchange batteries for hybridization | |

> SERVICE

TECHNICAL ASSISTANCE - Our Service Team is at your disposal for the technical assistance for ordinary and extraordinary maintenance operations on either ILMED Impianti and other brands cooling towers.

ORDINARY MAINTENANCE PROGRAM - Ilmed Impianti can propose you contracts for the ordinary planned maintenance on your cooling towers with the goal of keeping your machines efficient, reducing as much as possible problems, and giving you a prompt intervention service in case of faults.

SPARES STOCK - We keep in our warehouse a wide range of spare components which allow us to be faster on interventions and to shorten the breakdown time of your cooling towers and production as well.





ILMED IMPIANTI SRL

VIALE DEI MARESCHI 15 - 10051 AVIGLIANA (TO) - ITALY
 TEL +39 011.932.55.55 - FAX +39 011.936.72.89
 EMAIL impianti@ilmed.it - www.ilmedimpianti.com
<https://it.linkedin.com/company/ilmedimpianti>



Certified Company UNI EN ISO 9001:2015
 UNI EN ISO 14001:2015
 UNI ISO 45001:2023

COMPANY OF **ILMED GROUP.**

