

#### CHECK LIST TO BE MADE DURING THE VISIT BEFORE THE SCALA INSTALLATION

The following are some of the actions to be performed during the visit prior to the installation of a Scala split, compact or remote ice generator.

## POINTS TO CHECK FOR AN INDOOR UNIT (SPLIT, REMOTE OR COMPACT GENERATOR)

• The indoor unit must be located in a completely level area, with access to it from the sides for repairs. Keep in mind that in the upper part, above the gear motor, there should be a clear area of about 50 cm.



- The unit comes on a baseplate. If it is placed on a silo, the ice outlet position (cylindrical evaporator) must be adjusted with the hole in the silo lid.
- Check where it will be located, and see what lifting equipment is needed (if the customer has it available).
- If it is a compact unit, it is much heavier. Check weights and measures in the data sheet or with the factory.
- If the unit is mounted on the chamber, check how to access the installation area; it may be necessary to pass several sections with pipes on the floor of the chamber (from the ceiling of the chamber). Also check that the chamber can support the weight of the unit. If not, it will be necessary to reinforce the ceiling or place beams to hold the unit above the ceiling.
- If the unit is mounted on the chamber, make a hole according to the evaporator diameter. Drop tubes are available in units up to 5 tons, square, for ice drop. Check measurements with factory.
- Check water intakes to feed the indoor unit, remember that the unit comes with a 1.5 meter hose distance, <sup>3</sup>/<sub>4</sub>" inlet.
- Check existing drain, the unit needs a double drain, one for the overflow pipe and one for the 1/2" tank drain cock. It should be underneath the unit.





- Check the power socket. The unit comes with a 1.5 meter cable, with schuko plug. Single-phase, normally up to 3 tons consumption of 200W, with 1.5 mm<sup>2</sup> cable section is sufficient. If it is greater, check with the technical data sheet.
- In the case of a compact unit, a three-phase power supply is required, and power must be checked with the technical data sheet.
- It is always advisable to have a circuit breaker for the unit, independent from other units.
- In the case of a remote or split unit (connected to the central unit), check where to run the piping for connection to the outdoor unit or central cooling unit.
- In case the unit is connected to a central cooling unit, if the temperature is below -25°C, install a constant suction valve close to the suction of the indoor unit in order to keep the evaporation at -22°C.

# POINTS TO CHECK FOR AN OUTDOOR UNIT (REMOTE UNIT)

- Check the positioning of the condenser, on a level floor.
- Check that the position of the condensing unit is feasible and then connect the refrigerant piping to the indoor unit. Remember that Scala units do not require signal or electrical interconnection between the indoor and outdoor unit.
- Check unit accessibility, they are heavy, the Scala 2000 condensing unit weighs 263 kg and the upper ones will always need a crane or lifting equipment for positioning.
- Always try to place the condensing unit in an area with little sunlight.
- The 2000 units have a fairing condensing unit, which withstands water and sun. The upper ones, which are units without fairing, must be protected from the sun and rain. Also take into account the air passage to avoid any condensed air returning.



Condenser unit Scala 2000





Condenser unit Scala 3000, 5000 and 10000

- Electrical connection: the condensing units are three-phase, they have a terminal block in the unit frame for power supply. Check power ratings and recommended cable cross-sections in the technical data sheets or with the factory.
- It may be necessary to make an additional bench for the condensing units, due to their height, although they already have their own bench/legs.
- If the distance between the indoor and outdoor unit is more than 15/20 meters, talk to the factory to calculate extra refrigerant charge and/or change pipe section.



### CHECK LIST SCALA INSTALLATION, PRE-VISIT

### INDOOR UNIT (SCALA COMPACT, REMOTE OR SPLIT)

ELEMENT TO CHECK	ОК	OBSERVATIONS
Location: level ground, area clear around Scala location		
Height to ceiling from motor gearbox minimum 50 cm		
Ice outlet, from cylindrical evaporator, feasible?		
Scala overhead chamber ceiling: can it bear the weight?		
Need to drill a hole for ice outlet?		
Need for use of ice fall duct for ceiling passage?		
Means of elevation: Need for means to raise the unit to its position?		
Does the client have these available?		
<b>Water intakes:</b> Check where they are located, distance of 3/4" hose one and a half meters.		
Drainage inlet: Drainage required underneath the unit.		
<b>Power outlet:</b> Split or remote unit, single phase, schuko plug, meter and a half distance		
Compact Scala, three-phase, without cable		
Is there a magneto-thermal switch for the stand-alone unit?		
<b>Refrigeration piping:</b> Check location for piping to outdoor unit or central refrigeration unit (split or remote).		
Split connected to central cooling system, temperature below -25ºC?		



## OUTDOOR UNIT (SCALA REMOTE, CONDENSING UNIT)

ELEMENT TO CHECK	ОК	OBSERVATIONS
Location: level floor		
Check air flow in condensing unit to avoid return of condensed air.		
Direct sun on the unit? Roofing possible on units 3000 and above?		
Extra bench needed?		
Refrigeration piping: Check location for piping to indoor unit.		
Distance between indoor and outdoor unit more than 15/20 m?		
Means of elevation: Need of means to elevate the unit to its position?		
Does the client have these means?		
Power outlet: Three-phase outlet required, wired to unit.		

#### AUXILIARY ELEMENTS

ELEMENT TO CHECK	ОК	OBSERVATIONS
External photocell: Check if it is necessary, and where to install it		
Remote shutdown: Check where to install, it must be wired to indoor unit		