Initial Verification

Initial verification and start-up (commissioning) must be carried out by suitable qualified personnel.

Clearance	1. Ensure that cabinet of the humidifier is installed in a location where the humidifier can be serviced correctly.	☐
Electrical	2. Check that the power supply (voltage) conforms to the appliance name plate on the humidifier side.	☐
	3. Confirm that 24Vac is present between tab 1&2 of the control terminal, located on the control connection PCB. Remove the front top cover to get to this PCB.	☐
Water	4. Ensure that water is supplied to the humidifier. A shut-off and a non-return valve must be outside the humidifier. Once the water shut-off valve is turned ON, ensure that there are no apparent leaks.	☐
	5. Confirm that drain piping is properly connected with a pitch of at least 6.5mm per 300mm horizontal run.	☐
Steam	6. Check that steam distributors are properly installed into the ventilation duct.	☐
	7. Verify that the flexible steam hoses and rigid steam supply pipes are shorter in total length than 5 meters, properly sloped and have condensation P traps wherever required.	☐
Gas	8. Verify that a proper regulator and gas test point have been installed on the gas line to the humidifier.	☐
	9. Confirm that gas is supplied to the humidifier and that the shut-off valve located outside the humidifier is closed. Once the shut-off valve is turned ON, check for leaks, gas, smell or hissing sound.	☐
Flue Gases Venting	10. Verify the flue gases venting as follow:	☐
	a) A tee is installed with a drain trap for the flue gases condensate.	☐
	b) Check that all connections are air tight.	☐
	c) The total length of the vent equivalent is not longer than 30 meters.	☐
	d) An approved venting system is used.	☐
Note:	**Aluminum B vent is not acceptable.**	☐
Controls	11. Ensure that a high limit duct humidistat is installed, properly connected to the humidifier and that the setpoint is properly adjusted.	☐
	12. Verify that a room humidistat or return air duct humidistat is installed, properly connected to the humidifier and that the setpoint is properly adjusted	☐
	13. Turn the power ON at the disconnect switch. The LCD screen located on control panel must display the model number and serial number of the humidifier, along with the message “Unit is off”.	☐
	14. Confirm the control set-up of the humidifier (display #200). The humidifier is factory set with EXTERNAL control set-up, which means that the humidity demand is controlled by the room or duct humidistat.	☐
	15. Ensure that the type of signal (0-10Vdc, 2-10Vdc or 4-20mA) of the humidistat corresponds to the type set in the humidifier control set-up menu (display # 201).	☐

Start-Up

Start-up

1. Proceed to start-up the humidifier, as follow: ☐
   a) Open the front access door of the humidifier cabinet; make sure that the manual drain valve is closed. ☐
   b) Start up the humidifier by pushing the (ON/OFF) button located on the humidifier control panel. ☐
   c) After 5 seconds, water will start to fill.
   Verify that the water level slowly rises in the water level sight glass located on the side of the evaporation chamber ☐
   d) Verify that there is a humidity demand.
   Humidity demand is displayed on the humidifier LCD screen. ☐
   e) The humidifier LCD screen will display the water level in percentage (%).
   When the display indicates that the water level is at 100%, verify that the water level in the water level sight glass is approximately 20mm below the safety belt band of the evaporation chamber. ☐
   f) If there is a humidity demand, the burner combustion blower(s) will start, and after approximately 90 seconds the combustion will start.
   From a cold water start, the humidifier will require 5 to 10 minutes to produce steam.
   The Humidifier LCD display will indicate water temperature and flue gases temperature. ☐
   g) During normal operation while steam is produced, the water temperature must be 100˚C and the flue gases temperature around 120 to 200˚C.
   Water level percentage must not indicate less than 95%. ☐
   h) Observe for water, steam and flue gases leaks. ☐

Combustion Field Adjustment

2. Please refer to the *Combustion field adjustment instructions* enclosed in this package to perform this operation ☐

Safety Test

3. Check the location of the air flow switch in the system and its operation by stopping the fan.
   With no air movement in the air duct, the humidifier must automatically stop the combustion burner(s). ☐

4. Turn the humidifier OFF, by pushing the (ON/OFF) push button on the control panel. ☐

Drain and Reset

5. Execute a manual drain, by pushing the (DRAIN) push button on the control panel.
   A water jet directed on the water level sensor located in the water level sight glass will start and create bubbles around it. ☐
6. Reset the air flow switch and humidistat(s) to the proper value, if needed. ☐

End

7. The humidifier is now ready for normal operation. ☐