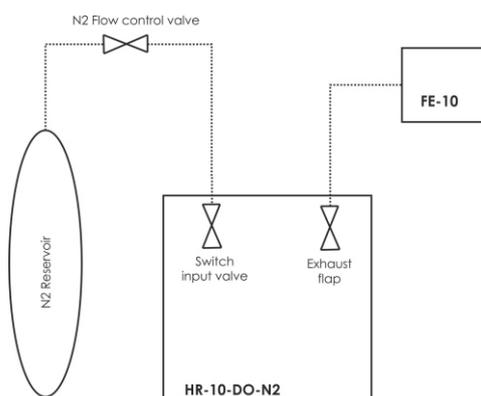


## Benchtop Reflow Oven HR-10-DO-N2

Smart Equipment with Nitrogen Atmosphere



- Small batch Oven for ROHS lead-free soldering
- Controlled via buttons and LCD display at front panel
- Programmable with Android application from Tablet or Smartphone
- 7" Tablet included in standard oven delivery
- Android App upgrades available from Google Play
- 99 reflow or dry programs preprogrammed and editable
- 2 models - motor driven or manual door opening
- Automatic forced PCB cooling after reflowing
- Improved solder results due to Nitrogen atmosphere
- Controlled nitrogen supply ensures the purity of the N2 atmosphere during reflow at a level of 98-99% purity.
- Solder fumes exhaust from the reflow chamber - optional



BASIC INFORMATION		SELECTED PROFILE	
HR10-000117			
SN: 000117 MAC BT: 00:12:6F:E3:E8:43			
<b>Tempering at 100°C</b>			
<b>T1=093°C T2=070°C</b>			
<b>Actual profile No.: 01</b>			
Profile name: Default reflow No.01			
Mode: Reflow			
Preheating temperature	150 °C		
Preheating time	100 s		
Reflowing temperature	210 °C		
Reflowing time	30 s		
Internal air temperature:	<b>+95.8 °C</b>		
Chamber temperature:	<b>+71.0 °C</b>		
External sensor:	-		

BASIC INFORMATION		SELECTED PROFILE	
HR10-000117			
SN: 000117 MAC BT: 00:12:6F:E3:E8:43			
<b>INSERT PCB AND CLOSE THE DOOR</b>			
<b>Actual profile No.: 01</b>			
Profile name: Default reflow No.01			
Mode: Reflow			
Preheating temperature	150 °C		
Preheating time	100 s		
Reflowing temperature	210 °C		
Reflowing time	30 s		
Internal air temperature:	<b>+97.5 °C</b>		
Chamber temperature:	<b>+122.0 °C</b>		
External sensor:	-		

(Screenshots of Android application)

# Reflow process with N2

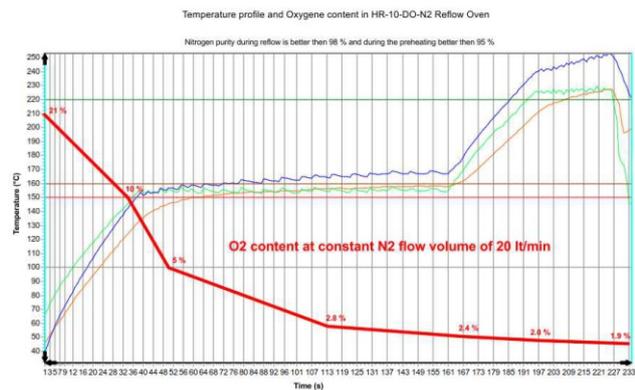
Benchtop Reflow oven with IR and convection heating. Forced hot-air convection ensures uniform temperature profile within the whole solder chamber. Fans placed under the grate ensure optimal cooling of PCB for achieving perfect solder joint structure. With connected Nitrogen input is there Inert atmosphere.

## How does it work?

Connect the oven to a power source, N2 input to regulated Nitrogen supply and the dump exhaust to an exhaust unit FE-10. The oven is searching for a paired tablet or smartphone. When one of those devices is connected, start the Android App.

You can set basic app and oven parameters as well as an option to program desired temperature profiles. When the oven is properly programmed, the user can control the process with buttons and LCD display at the front panel. There is an sound signal when the reflow process is over. The same signal appears in the tablet or smartphone. Immediately after soaking is started exhaust and after door opening also fans started forced cooling.

The Android application displays the process status, time and temperature or other info. An application for IOS systems is being planned.



ii	Technical details
Max. PCB size	320 x 220 mm
Max. preheat temperature	200 °C
Preheat time	10 - 600 s
Max. reflow temperature	260 °C
Reflow time	1 - 300 s
Max. drying temperature	150 °C
Drying time	1 - 999 mins = 16 hours
Cooling	2 fans on the base, 360 l/min
Solder fumes exhaust	Switched after reflow, 1500 l/min (Option)
Number of programmes	99 - reflow or dry
Measuring thermocouples	K-type, 2 pcs inside chamber + 1 external
Max. component height	55 mm to the top, 30 mm to the bottom
Power supply / consumption	230 V, 50 Hz, single-phase, 3100 W max.
N2 consumption	0 - 720 lt/hour
N2 input pressure	2 - 6 bar
Operating conditions	Temperature 15 - 30 °C, Humidity 30 - 80 % RH
Dimensions (L x W x H)	505 x 362 x 340 mm
Weight	18 kgs