

Vacuum Hot Press (VHP)

Hot pressing is a high-pressure, low-strain-rate powder metallurgy process for forming of a powder or powder compact at a temperature high enough to induced sintering and creep processes.

With Vacuum Hot Pressing machine, dense forming of materials under the vacuum, high temperature and high pressure is possible and new materials with certain special properties, such as the amorphous phase, reduced material gap, increased strength and rigidity and even change in the structure of the materials can be obtained.



Features:

- High heating and cooling rate
- Ability of producing the wide range of metals, ceramics and composites
- Ability to develop temperature and force in system by customer order
- Fully automatic control and programmable system
- Measuring of compression path and speed
- Camera and recording system
- User friendly interface
- Cost efficient product

SPECIFICATION
Double wall stainless steel chamber, water cool, volume 50 lit and door lock sensor
Hydraulic system consists of a double-acting 15 tone with servo valve
Water cooled cold compression rods
Induction furnace max temperature 1500 °C
Temperature measurement by thermocouple optionally control by pyrometer
Automatic vacuum system for an ultimate pressure of 5×10^{-2} mbar
Inert gas system
Touchscreen monitor 7 inch TFT