

## INDUSTRIAL SCALE FURNACES

### VACUUM FURNACE

The MSE vacuum furnaces are designed for the samples not to come into contact with air during the heat treatment and to complete the process with the least deformation. Also the diffusion pump or turbomolecular pump can be selected. Vacuum furnaces can be made of graphite, tungsten and molybdenum according to customer request by MSE.

- T<sub>max</sub>: 2500 °C
- Able to set programmable temperature, time and soaking time, display of cooling water temperature and process details, and data save by USB connection feature via PLC controller, touch screen, adjustable vacuum level.
- Reinforced vacuum cabinet
- Water flowmeters for cooling water temperature through cabin and connections
- Integrated 10<sup>-5</sup> mbar ultra high vacuum pump system
- Side-opening furnace lid
- Excessive temperature blocking
- Sealed, water cooled and reinforced ultra high vacuum cabin
- Heating on around\*\*
- Programme temperature sensitivity ±1°C
- Adjustable gas flowmeter
- Tungsten heating resistance
- Adjustable temperature up to 1800 °C,
- Heating speed min. 1°C/min, max. 10°C/min,
- Non-leaky gas feature
- Water cooled atmosphere cabinet
- Tungsten heating resistance

1800°C, 3 Lt  
10<sup>-5</sup> mbar vacuum



# INDUSTRIAL SCALE FURNACES

## VACUUM FURNACE SERIES

Vacuum furnaces are available in wide a ranges of pressure up to 10(-5)mbar and temperatures from 450°C to 2500°C continuous use. The standard models of vacuum furnaces are listed below. Please contact us for detailed information.

Product Code	Max. Temperature °C	Volume (L)	Internal Dimensions		
			Width (mm)	Height (mm)	Depth (mm)
VF_1100_5	1100	5	170	170	175
VF_1100_8	1100	8	200	200	200
VF_1100_12	1100	12	200	200	300
VF_1100_15	1100	15	200	250	300
VF_1100_18	1100	18	250	250	300
VF_1100_*	1100	*	*	*	*

\*Produced on demand by the customer.

Product Code	Max. Temperature °C	Volume (L)	Internal Dimensions		
			Width (mm)	Height (mm)	Depth (mm)
VF_1200_5	1200	5	170	170	175
VF_1200_8	1200	8	200	200	200
VF_1200_12	1200	12	200	200	300
VF_1200_15	1200	15	200	250	300
VF_1200_18	1200	18	250	250	300
VF_1200_*	1200	*	*	*	*

\*Produced on demand by the customer.

Product Code	Max. Temperature °C	Volume (L)	Internal Dimensions		
			Width (mm)	Height (mm)	Depth (mm)
VF_2200_5	2200	5	170	170	175
VF_2200_8	2200	8	180	190	245
VF_2200_*	2200	*	*	*	*

\*Produced on demand by the customer.

Product Code	Max. Temperature °C	Volume (L)	Internal Dimensions		
			Width (mm)	Height (mm)	Depth (mm)
VF_1600_5	1600	5	170	175	170
VF_1600_8	1600	8	180	190	245
VF_1600_15	1600	15	200	200	350
VF_1600_18	1600	18	250	250	300
VF_1600_*	1600	*	*	*	*

\*Produced on demand by the customer.

Product Code	Max. Temperature °C	Volume (L)	Internal Dimensions		
			Width (mm)	Height (mm)	Depth (mm)
VF_1700_5	1700	5	170	170	175
VF_1700_8	1700	8	180	190	245
VF_1700_15	1700	15	200	200	350
VF_1700_18	1700	18	250	250	300
VF_1700_*	1700	*	*	*	*

\*Produced on demand by the customer.

