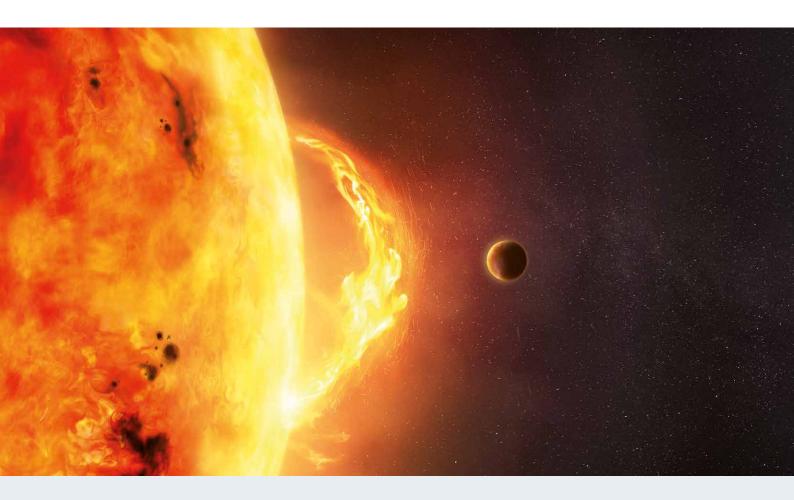


Highly recommendable!

Be it production, quality assurance or research and development - you must be able to rely on your ovens. We'll support you.



Optimum heat for any process.

Today, the demand for reliable, fast and energy-efficient heat treatments is greater than ever in the automotive and aerospace industries, the electronics and bio-pharmaceutical industries as well as in university research laboratories. Many old devices have been in use for decades and no longer meet the growing current requirements. With our Industrial Laboratory Ovens we offer you heating and drying ovens for product development, quality testing, thermal ageing and testing of plastics samples as specified in standards - the tailor-made solution for your special process.

For hot and heavy applications.

Our Industrial Laboratory Ovens feature a processing chamber volume between 60 and 200 litres and are designed especially for heavy-duty applications in industrial environments, requiring robust constructions. They are ideal for applications requiring high precision temperature control in the range between +50 and +300 °C, guaranteeing reproducible, reliable results. While offering the same interior space as old units, they are beating them with both higher performance and lower footprint. Simply perfect for you!

Small, strong, smart.

Industrial Laboratory Ovens.

Save investing in extra testing cabinets.

Thanks to their excellent technical features, our Industrial Laboratory Ovens can even be employed as testing cabinets. Reaching a temperature accuracy of ±1% of the actual value, they meet plastics material testing standards such as e.g. DIN 53508, DIN EN 60216-4-1 or ISO 188. This makes separate testing cabinets obsolete, reducing your investment costs. An additional factory or even DAkkS calibration ensures enhanced testing and documentation safety. We are accredited for this purpose, in both service and quality assurance.

Networked to the future!

Industrial Laboratory Ovens can be integrated into the industry 4.0 world at any time. A PID temperature controller, especially adapted for us, features an Ethernet interface running the TCP/IP protocol. Network connectivity and process documentation are achieved by the S!MPATI® software. Our reliable, tested controller package additionally features programming, timer and alarm functions.

Replacement made easy.

If your laboratory ovens are counting lots of years, a replacement will always pay off for you. Our Industry Laboratory Ovens feature innovative, future-proof equipment, offering the same interior dimensions as your current Heraeus series 6000 units. This way, you can simply replace your old laboratory ovens without hassle.





Our highlights:

- Innovative, reliable and accurate
- Optimally suited for heavy-duty operation due to a control box in IP54
- Future-proof networking options
- Ideal replacement for old units
- Achievement of individual solutions

More equipment, right from the start.

Basic equipment setting standards.

Interior



Easy replacement

Since they feature the same interior dimensions, Industrial Laboratory Ovens are the ideal replacement for known older units. There is no need for adaption to existing loading and testing equipment and batch carriers.

· Uncompromising quality

All interior housings of our Industrial Laboratory Ovens are made of stainless steel, type 1.4301 (ANSI 316) and thus offer maximum corrosion protection.

Regulation & Control



• Industry 4.0 - networked to the future

A temperature controller with Ethernet interface running the TCP/IP protocol has been especially adapted for our Industrial Laboratory Ovens. This enables optimum connection to **S!M**PATI® and networking with compatible units, such as **weiss**technik Environmental Simulation Cabinets or **vötsch**oven Heating and Drying Ovens.

Safety



No compromise

All Industrial Laboratory Ovens meet the requirements of the Machinery Directive (declaration of conformity to Machinery Directive 2006/42/EC) and therefore may be installed in production environments in any case.

· Safe means safe

Our control boxes in IP54 feature extreme tightness, offering maximum protection of components from environmental influences in rough industrial environments. Even a deployment in flammable premises according to VdS 2033 is possible.

You can find further details on equipment in our technical descriptions. Contact us.



Illustration is similar, contains additional equipment

Exclusively designed for you: The unique software documentation package for perfect batch record.



The right choice by standard.

Industrial Laboratory Ovens Basic, Premium and Premium Plus.







Our Industrial Laboratory Ovens are now available in three stock lines - leaving no serial wish unfulfilled.

Industrial Laboratory Ovens Basic

Already the version Basic offers numerous features for typical routine tasks and applications.

- PID temperature controller diraTRON for precise temperature control
- Over temperature protection with class 2 temperature limiter
- Exhaust air flap for adjustment of the air exchange rate
- Potential-free alarm contact for connection to a central monitoring system
- Door contact switch for safe shut-down of circulating air and heating upon opening

Industrial Laboratory Ovens Premium

Acquire additional sensible features ideal for many process and testing tasks with our version Premium from the beginning.

- Gas-tight welded interior casing for safe dissipation of problematic substances
- Recirculating air fan speed controller for exact adaptation of the air speed in the processing chamber
- Access port for introduction of additional cables and sensors

Industrial Laboratory Ovens Premium Plus

Our version Premium Plus adds a very strong exhaust air fan to the oven. This allows for substantially higher air exchange rates, e.g. for high moisture levels if a lot of condensate is expected or fast cooling is required.

You can find further details on equipment in our technical descriptions. Contact us.

Matched to your needs:

Special wishes, such as additional access ports, different temperature controllers or additional temperature sensors are no problem at all.

Convincing technology. Reliable results.

The performance data at a glance:

Equipment		Lab 60	Lab 100	Lab 200
Rated temperature	°C	300	300	300
Processing chamber dimensions, WxHxD	mm	403x380x340	554x524x340	554x664x503
Steam chamber volume	1	61	115	205
Exterior dimensions, WxHxD	mm	728x556x538	879x700x538	879x820x715
Temperature distribution in the room at actual temperature ¹	%	±1		
Rated output	kW	1.8	2.3	3.1
Rated voltage		1/N/PE 230 V; 50/60 Hz		
Circulating airflow rate	m³/h	200		
Air exchange rate ²	1/h	3-60		
Equipment		Lab 60 Basic	Lab 100 Basic	Lab 200 Basic
PID temperature controller diraTRON		•	•	•
Programme function		•	•	•
Timer function		•	•	•
Ethernet interface		•	•	•
Potential-free alarm contact		•	•	•
Temperature limiter class 2		•	•	•
Lockable door		•	•	•
Door contact switch		•	•	•
Wire mesh trays incl./max.		2/10	2/14	2/18
Equipment (additional)		Lab 60 Premium	Lab 100 Premium	Lab 200 Premium
Interior housing, welded seal-tight ³		•	•	•
Speed controller for circulating air fan (mar	nual)	•	•	•
Access port, diameter 23 mm in the right side wall		•	•	•
Equipment (additional)		Lab 60 Premium Plus	Lab 100 Premium Plus	Lab 200 Premium Plus
Exhaust air fan with speed controller (manual)4		•	•	•

 $^{^{\}scriptscriptstyle 1}\!\text{At}$ low air exchange rate and in empty chamber.

^{*}Depending on the temperature and exhaust air flap setting.
*Practically gas-tight.

*Reduced rated temperature 200 °C at 100% exhaust airflow rate.

Become more efficient.

Our solutions will save you time and money.

Get the most out of your facility.



Create your own perfect process with the software package S!MPATI®.

Process management/documentation/networking

- Up to 99 systems can be connected
- Programs for automated processes
- Documentation, visualisation and management of process data
- Traceability of process data for seamless quality control



We measure ourselves by our service!

Our services - lots of good reasons:

- Global service network
- Wide selection of preventive maintenance
- Reliable spare part supply
- Special deployments available any time
- Certified proper disposal of outdated devices

Our Service Experts are always near you.

24/7-Service-Helpline: +49 1805 666 556

Optimising processes together.

Precise and specific temperature testing of elastomeric seals.

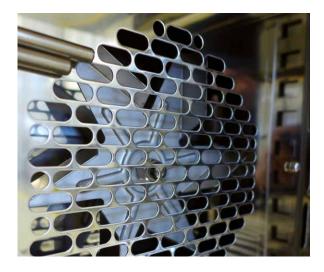
Reheating is a vital process step in the production of dynamic and static seals of elastomeric materials. It ensures the desired function and quality of the products and is an indispensable part of the manufacturing chain.

A leading specialist in sealing technology processes his products worldwide for many years with custom-designed **vötsch**oven Industrial Ovens. As part of a customer-specific project, we have defined the respective process parameters for **vötsch**oven Laboratory Ovens, too. The objective was to duplicate the conditions of the production process for the adjacent quality testing labs.

The post-cross-linking, annealing or reheating of elastomeric seals upon vulcanisation is a complex process. Customers, particularly in the sectors automotive and industry, pose stringent quality requirements. To meet them all, testing parameters must be safe and reproducible.

The testing equipment employed must meet three requirements:

- It must operate with highest reliability.
- It must exclude that operating errors can alter settings and processes.
 This is arranged by the intelligent, networked controller Eurotherm with central process programing.
- It must ensure, by the design of the testing cabinet, optimum temperature distribution, at low (>30 1/h) and high air exchange rates (>100 1/h). Both exchange rates are monitored, indicated and documented.





Hot. Hotter. HeatEvent.

The new generation of vötschoven Heating and Drying Ovens.

Where things get hot and a processing chamber volume of more than 200 litres is needed, decision makers around the world opt for the numerous advantages of HeatEvent. Acquaint yourself with our latest innovation.

More ideas included.

Our unique design allows the largest possible processing chamber volume at lowest footprint. More intelligence and comfort are added as standard by the tried and proven controller **S!M**PAC®. And a comprehensive safety package prevents superheating.

More space.

Even with a door opening angle of only 90 degrees, the entire interior is now accessible for the first time. Combined with a front access switch box, it allows for space-saving set-up of several ovens side by side and along a wall.

More flexibility.

The HeatEvent programme includes seven sizes with a processing chamber volume of between 200 and 8,000 litres and rated temperatures of up to +350 °C. The tried and proven modular design and the comprehensive range of optional equipment allows numerous variants for your applications.

More safety with HeatEvent F.

(For flammable substances according to EN 1539.) Drying of surface coatings, mould and resin varnish can lead to release of flammable substances that may mix with the process air to form an explosive gas mixture. The HeatEvent F series has been specifically designed for this. It ensures safe control of the processes by limiting the amount of solvents released and a constant exhaust airflow. Thereby this unit series prevents already any possible formation of explosive atmosphere inside the processing chamber.



Passionately innovative.

We work in partnership to support companies in research, development, production and quality assurance. With 22 companies in 15 countries at 40 locations.

weisstechnik Test it. Heat it. Cool it.



Environmental Simulation

The first choice for engineers and researchers for innovative, safe environmental simulation facilities. In fast motion, our test systems can simulate all the influences in the world as well as for instance in space. In temperature, climate, corrosion, dust or combined stress tests. With a very high degree of reproducibility and precision.



Heat Technology

Experienced engineers and designers develop, plan and produce high-quality, reliable heat technology systems for a broad range of applications from heating and drying cabinets to microwave systems and industrial furnaces.



Air Solutions

As the leading provider of clean rooms, climate technology and air dehumidification, we consistently ensure optimal climatic conditions for people and machines. For industrial production processes, in hospitals, mobile operation tents or in the field of information and telecommunications technology. From project planning to implementation.



Pharmaceutical Technology

With decades of experience and know-how, we guarantee the most sophisticated clean air and containment solutions. Our comprehensive and innovative range of products includes barrier systems, laminar flow systems, safety workbenches, isolators, airlocks and stability test systems.

Vötsch Industrietechnik GmbH

Heat Technology Greizer Straße 41-49 35447 Reiskirchen/Germany Telefon +49 6408 84-73 info.ovens@weiss-technik.com www.weiss-technik.com







HT-Indl abOfen-01.1F/PP 1.0/10 2019

