

## Take a deep breath.

Clean air is essential in the laboratory. Köttermann laboratory fume cupboards ensure that you can work in a healthy climate. Due to outstanding aerodynamics, hazardous substances and odours are effectively extracted and exchanged for fresh air.



## Meets your needs exactly.

Köttermann fume cupboards can be individually assembled according to your requirements. This means work processes in the laboratory are supported systematically and efficiently. The unique, modular system of our fume cupboard range makes this possible.



## Always at hand.

Would you like to have a comprehensive range of services supplied directly to the fume cupboard? That's no problem at all – because a Köttermann fume cupboard can be equipped and retrofitted with a large number of taps.

On the front side the fume cupboard columns contain the control valves for the taps. That is not only very ergonomic but also very safe because you do not have to lean into the fume cupboard to reach the taps.

# Fume cupboards

## Certified safety.

Köttermann laboratory fume cupboards exceed by far the requirements of international standards in accordance with EN and achieve outstanding results even in the demanding robustness test.

**Köttermann**  
Systemlabor

**Certificate of compliance with  
EN 14175**

**CERTIFICATE No:** 2-453 / 2004-121

**Fume Cupboard Manufacturer:** Köttermann GmbH & Co KG  
Industriestraße 2-10  
31311 Uetze, Germany

**Certified by:** Köttermann GmbH & Co KG  
Industriestraße 2-10  
31311 Uetze, Germany

**Fume Cupboard Type:**

Walk-in type: BA 1200\*000\*900mm  
Sash width: 900 mm  
Test opening height: 500 mm  
Table height: 000 mm

This is to certify that the fume cupboard described above has been tested in accordance with EN 14175-3 type test methods and procedures and it complied with specifications for performance therein. The results are noted in the report 2-453-2004-121.

Uetze, October 2006

*ppa. Andreas Abels*  
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*LA. Christian Köttermann*  
LA. Christian Köttermann

**CERTIFICATE**

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**AutoProtect**  
As standard with every fume cupboard\*



## Your benefits:

- » Increased safety through closed front sash
- » Comfortable operation through unique Softmatic
- » Reduced operating costs for controlled fume cupboards

# Köttermann AutoProtect

Automatic, ergonomic, safe.

AutoProtect is the active protection for all people who work at the fume cupboard. AutoProtect automatically closes the front sash and reduces potential danger to an absolute minimum.



Working with open front sash.



If no-one works at the cupboard ...



... AutoProtect automatically closes the front sash.

- **AutoProtect for increased safety**

If there is no activity in front of the fume cupboard, AutoProtect automatically closes the front sash.

- **AutoProtect for more ergonomic work**

Softmatic opens or closes the front sash initiated by the slightest touch.

- **AutoProtect with integrated front sash stop**

The non-impact stop unit electronically opens the front sash always to the correct height.

- **AutoProtect optional with light barrier**

The light barrier stops the closure if any obstacles are detected.

- **AutoProtect optional with foot switch**

The foot switch facilitates automatic opening of the front sash, if you just don't have a hand free.

**Tested according to  
EN 14173-T3**



### Your benefits:

- » Outstanding performance in accordance with EN 14175
- » Perfectly controlled by the digital air flow monitor
- » Low operating costs due to low air flow rate
- » Extra large interior depth (800 mm)
- » Fume cupboards up to a width of 2100 mm provide plenty of space for your tests
- » More safety as standard - AutoProtect, the intelligent front sash controller

# Standard laboratory fume cupboards

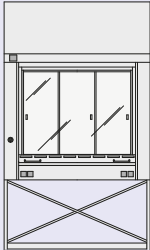


## Reliable, safe and multifunctional.

Standard fume cupboards or general fume cupboards are designed for universal use in the laboratory. All Köttermann fume cupboards are distinguished by their user friendliness and their excellent safety record. They all come with the unique Köttermann extraction system, which produces outstanding results even in the demanding EN 14175 robustness test – for your safety.



The spacious interior depth of 800 mm provides room for test setups and all kinds of equipment. For small parts we install practical drawers.

	Dimensions	Field of application	Fittings
	b: 1200 mm 1500 mm 1800 mm 2000 mm 2100 mm h: 2550 mm t: 900 mm For room heights over approx. 3 m*.	For general purposes.  <b>Not</b> suitable for work with strong, concentrated mineral acids.  <b>Partly</b> suitable for handling radioactive substances.	<b>General purpose fume cupboards</b> Tested according to EN 14175 Sash: One-piece sash with panels made of laminated safety glass Front height: 2550 mm Interior: Coated steel Interior height: 1500 mm

\*the minimum required room height depends on the type of air extraction

**Tested according to  
EN 14173-T3**



### Your benefits:

- » Full functionality in low rooms
- » Outstanding performance in accordance with EN 14175
- » Perfectly controlled by the digital air flow monitor
- » Low operating costs due to low air flow rate
- » Extra large interior depth (800 mm)
- » Fume cupboards up to a width of 2100 mm provide plenty of space for your tests
- » More safety as standard – AutoProtect, the intelligent front sash controller



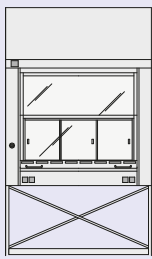
# Fume cupboards for low ceilings

## Always a perfect fit.

Köttermann has special fume cupboards for ceiling heights under three metres. You will find fume cupboards to fit any room height. They are all equipped with two-piece telescopic sashes.



We can deliver fume cupboards for the use in rooms with low ceilings in different front heights. We can find suitable fume cupboards for every ceiling height.

	Dimensions	Field of application	Fittings
	b: 1200 mm 1500 mm 1800 mm h: 2250 mm t: 900 mm For room heights over approx. 2.4 m*.	For general purposes. <b>Not</b> suitable for work with strong, concentrated mineral acids. <b>Partly</b> suitable for handling radioactive substances.	<b>General purpose fume cupboards</b> Tested according to EN 14175 Sash: Telescopic sash with panels made of laminated safety glass Front height: 2250 mm Interior: Coated steel Interior height: 1200 mm
	b: 1200 mm 1500 mm 1800 mm 2000 mm 2100 mm h: 2550 mm t: 900 mm For room heights over approx. 2.7 m*.	For general purposes. <b>Not</b> suitable for work with strong, concentrated mineral acids. <b>Partly</b> suitable for handling radioactive substances.	<b>General purpose fume cupboards</b> Tested according to EN 14175 Sash: Telescopic sash with panels made of laminated safety glass Front height: 2550 mm Interior: Coated steel Interior height: 1200 mm

\*the minimum required room height depends on the type of air extraction.  
 For detailed descriptions as well as further technical details, please see pages 166-167.

**Tested according to  
EN 14173-T3**



### Your benefits:

- » Outstanding performance in accordance with DIN 12924-2 and EN 14175
- » Enormous resistance due to linings made of large ceramic or polypropylene panels
- » Perfectly controlled by the digital air flow monitor
- » Extra large interior depth (800 mm)
- » More safety as standard - AutoProtect, the intelligent front sash controller

# High performance fume cupboards

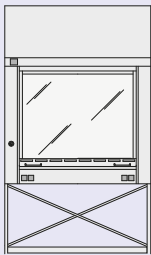


## Sturdy when it matters.

You can use high performance fume cupboards whenever you work with aggressive substances such as strong acids or elevated temperatures. For example acid digestion.



Storage of chemicals directly at the point of use: Acid and base cabinets as ideal underbench cabinets for high performance cupboards.

	Dimensions	Field of application	Fittings
	b: 1200 mm 1500 mm 1800 mm h: 2250 mm 2550 mm t: 900 mm For room heights over approx. 2.9 m*.	For work with aggressive chemicals. <b>Not</b> suitable for work with hydrofluoric acid. <b>Partly</b> suitable for handling radioactive substances.	<b>Fume cupboards for open digestion</b> Tested according to EN 14175 and DIN 12924 Part 2 Sash: One-piece sash with panels made of laminated safety glass Interior: Large panels of white ceramic
	b: 1200 mm 1500 mm 1800 mm h: 2250 mm 2550 mm t: 900 mm For room heights over approx. 2.9 m*.	For work with aggressive chemicals. <b>Particularly</b> suitable for works with hydrofluoric acid. <b>Partly</b> suitable for handling radioactive substances.	<b>Fume cupboards for open digestion</b> Tested according to EN 14175 and DIN 12924 Part 2 Sash: Single sheet from poly carbonate Interior: Large, white polypropylene

\* the minimum required room height depends on the type of air extraction.

A detailed overview of available fume cupboards as well as further technical details can be found on pages 169-170.

**Tested according to  
EN 14173-T3**



## Your benefits:

- » Outstanding performance in accordance with DIN 25466 and EN 14175
- » Perfectly controlled by the digital air flow monitor
- » Can be easily decontaminated due to joint-free stainless steel worktop
- » Loading capacity of the worktop 1.5 t – for heavy lead shielding
- » Optional filter for radioactive substances and particles
- » Extra large interior depth (800 mm)
- » More safety as standard - AutoProtect, the intelligent front sash controller

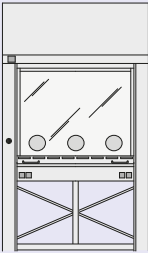
# Radionuclide fume cupboards

## The specialists.

Radionuclide fume cupboards are especially designed for works with radioactive material. They can easily be decontaminated and even support heavy lead shielding.



Contaminated waste liquids are collected directly through the worktop in containers provided for this purpose. The fill level monitor alerts the user in time before overflowing.

	Dimensions	Field of application	Fittings
	b: 1200 mm h: 2550 mm t: 900 mm For room heights over approx. 2.9 m*.	For work with radioactive isotopes.	<b>Radionuclide fume cupboards</b> Tested according to EN 14175 and DIN 25466 Sash: One-piece panel made of acrylic glass with glove ports Interior: Coated steel
	b: 900 mm h: 2400 mm t: 900 mm	Removes particles and corrosive gas out of the fume cupboard extracted air.	<b>Filter cabinet for radionuclide fume cupboards to equip individually with:</b> <ul style="list-style-type: none"> <li>• Coarse filters</li> <li>• High performance filters for suspended matter</li> <li>• (Endowed) activated carbon filters</li> <li>• Grit filters</li> </ul>

\*the minimum required room height depends on the type of air extraction.  
 A detailed overview of available fume cupboards as well as further technical details can be found on pages 171.



## Your benefits:

- » Outstanding safety, documented by technical measurements
- » Perfectly controlled by the digital air flow monitor
- » High interior for large test setups
- » Distillation fume cupboards: More safety as standard – AutoProtect, the intelligent front sash controller

# Walk-in and distillation fume cupboards

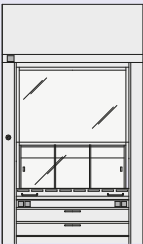
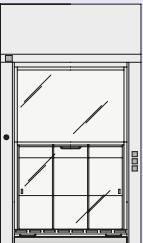


## Room for large tests.

Walk-in fume cupboards and distillation fume cupboards are ideal for setting up large equipment, for example for distillation columns or chromatography columns.



Very practical: entire test setups can be transported into the walk-in fume cupboard on a free standing table.

	Dimensions	Field of application	Fittings
	b: 1200 mm 1500 mm 1800 mm 2000 mm 2100 mm h: 2550 mm t: 900 mm For room heights over approx. 3 m*.	For work with large equipment.	<b>General purpose distillation fume cupboards</b> Sash: Two-piece panel made of laminated safety glass Interior: Coated steel
	b: 1200 mm 1500 mm 1800 mm 2000 mm 2100 mm h: 2550 mm t: 900 mm For room heights over approx. 3 m*.	For work with large equipment or mobile tables.	<b>General purpose walk-in fume cupboards</b> Sash: Two sashes with panels made of laminated safety glass Interior: Coated steel

\*the minimum required room height depends on the type of air extraction.

A detailed overview of available fume cupboards as well as further technical details can be found on pages 168-169.

# The fume cupboard made to measure

## Individual system.

Designed according to your needs: A suitable fume cupboard can be assembled for every application from a variety of parts.

## The housing.

- Interior height 1900 mm (distillation fume cupboard)
- Interior height 2400 mm (walk-in fume cupboard)
- Interior height 1500 mm
- Interior height 1200 mm
- Ceramic lining
- Polypropylene lining
- HPL lining

## The housing sides.

- Closed
- Continuously glazed
- With pass-through
- With cable pass-through

## The worktops.

- Ceramic
- Composite ceramic
- Brown laboratory tiles
- Epoxy
- Polypropylene
- Trespa TopLab Plus
- Stainless steel

## The underbench cabinets.

- Without (covered)
- Standard underbench cabinet (optionally extractable)
- Underbench chemical storage cabinet
- Underbench acid and base cabinet
- Underbench safety cabinet for flammable hazardous substances

## The services.

- Gases/high-purity gases
- Water/deionised water
- Cooling water/vacuum
- 230 V/400 V
- Fuses/isolation switches
- ...