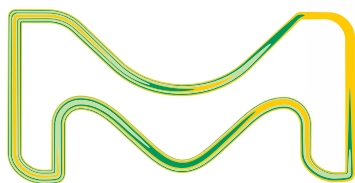


# SOAK IT UP

## Chemizorb® absorbents

The fast, safe and easy way to  
clear up chemical spills



The life science business  
of Merck operates as  
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U.S. and Canada.

**Supelco®**  
Analytical Products

# SPILLS HAPPEN

## Chemizorb® absorbents for spilled liquids

With Chemizorb® absorbents, you can clear away aggressive or unpleasant liquids quickly and safely. Our fast-acting absorbents consist of porous mineral or synthetic copolymers that are chemically inert, and capable of absorbing up to 400% of their own weight in liquid.

### Handling

All Chemizorb® absorbents are used in a similar way:

1. Cover spilled liquids with sufficient absorbent
2. Use a spatula, spoon, or small shovel to mix the absorbent and spilled liquid
3. Wait until neutralization and absorption processes are complete
4. Collect the used absorbent in a polyethylene (PE) bag
5. Thoroughly clean contaminated surface with plenty of water

**Specific usage instructions are provided on each product's label.**

### Disposal

The used absorbent should be collected in a polyethylene bag, and sent for disposal in accordance with the company regulations and national guidelines for the hazardous products in question.

### Features & Benefits

#### Easy dosing

Wide bottle neck and integrated handle facilitate

#### Prompt action

The red Chemizorb® absorbents bottle is quickly recognizable in emergencies

#### Rapid safety

Chemizorb® absorbents can be distributed directly over the spilled liquid, and requires no accessories

#### Personal protection

Quick adsorption reduces time exposed to the spilled chemical

#### Cost efficiency

Thanks to its high capacity, less absorbents is needed for each application

#### Simple disposal

Used absorbed is placed in a PE bag and disposed of according to company and national guidelines

#### Clear process monitoring

The pH indicator allows you to easily keep track of the neutralization process



## Packaging

The HPDE bottle for Chemizorb® absorbents is specially designed to facilitate cleanup work. Its wide neck allows easy dispensing straight from the bottle, while its integrated handle ensures comfortable transport and dosage. In emergencies, its bright red color stands out among other HPDE bottles.

To avoid errors, the packaging's label and shape clearly indicate the product type and name, even during the application process. The different product types of Chemizorb® absorbents can be easily and safely identified by their specific label colors.

# PRODUCT INFORMATION

Spilled substance												Type	
Alkalies (diluted)	Alkalies (concentrated)	Acids (diluted)	Acids (concentrated)	Acid chlorides	Hydrofluoric acid	Aqueous solutions	Heating-bath liquids	Organic solvents	Paraffin oils	Viscous oils	Powder	Granulate	Neutralization Indicators
	•		•	•		•	•	•	•	•	•		
	•		•	•		•	•	•	•			•	
•	•					(•) <sup>1</sup>					•		•
		•	•	•		(•) <sup>2</sup>						•	•
		•			•						•		•

<sup>1</sup> alkaline aqueous solution

<sup>2</sup> acetic aqueous solution

Neutralization		Additional information			Product	Cat. No.	
Neutralizer	Color change	Mineral copolymer	Synthetic copolymer	General information			
<b>Allrounder</b>							
		•		More suitable to use in calm areas or inside (Dust formation!). Bromine must first be treated with thiosulfate solution. Hydrofluoric acid with sodium hydroxide solution before applying.	<b>Chemizorb® Powder</b>	<b>1.02051</b>	<b>Page 06</b>
		•		More suitable to use e.g. in draughty rooms or outside. Bromine must first be treated with thiosulfate solution. Hydrofluoric acid with sodium hydroxide solution before applying. <b>Not suitable for viscous oils</b>	<b>Chemizorb® Granules</b>	<b>1.01568</b>	<b>Page 06</b>
<b>Specialists</b>							
Acidic salt	Blue to pale blue	•			<b>Chemizorb® OH<sup>-</sup></b>	<b>1.01596</b>	<b>Page 08</b>
Calcium salt	Red to pale yellow	•		<b>Not suitable for Hydrofluoric acid</b>	<b>Chemizorb® H<sup>+</sup></b>	<b>1.02491</b>	<b>Page 09</b>
Alkaline	Red to rose		•		<b>Chemizorb® HF</b>	<b>1.01591</b>	<b>Page 09</b>

# ONE FOR ALL

## Quick help for multiple spillages

Chemizorb® powder and granules are insoluble in water and all other media that are liquid at room temperature. These “all-rounders” are suitable for removing almost any type of liquid spills, such as acids, alkalis, organic solvents and oils.

### Dosage

The required amount of Chemizorb® absorbents powder or granules depends on the type and quantity of the spilled liquid. Chemizorb® absorbents should be added until the spill is completely absorbed.



## Chemizorb® Powder

Absorbent for spilled liquids

### Absorbance capacity

Aqueous solution  
1–2 times its own weight

Organic solvent/oil  
2–4 times its own weight

### Ordering information

Pack size	Packaging	Cat. No.
500 g	PE bottle	1.02051.0500
25 kg	Fibre carton	1.02051.9025

### General information

The powder form possess a slightly higher absorbance capacity than the granules.

Suitable for: concentrated acids and alkalis, acid chlorides, aqueous solutions, organic solvents, and paraffin oils.

## Chemizorb® Granules

Absorbent for spilled liquids



### Absorbance capacity

100% of its own weight

### Ordering information

Pack size	Packaging	Cat. No.
1 kg	PE bottle	1.01568.1000
5 kg	Bucket, plastic	1.01568.5000
20 kg	Paper sack	1.01568.9020
20 kg	PE drum	1.01568.9021

### General information

The granulates are more suitable for areas where the powder form cannot be used due to its finer particle size, e.g. draughty rooms or outdoors.

Suitable for: concentrated acids and alkalis, acid chlorides, aqueous solutions, organic solvents, and paraffin oils.

Not suitable for: viscous oils

# BULK UP

## to meet the challenge!

Whether in the lab, production plant or warehouse, any chemical spill is a problem. And, the bigger the spill, the greater the risk of personal injury and other hazards.

With Chemizorb® absorbents, you're always prepared. Our absorbents are available in different pack sizes and materials to help you overcome the challenges of spills — great or small.



# MAKE USE OF OUR EXPERIENCE

## Use the specialists

We offer specific absorbents for alkalis, acids, and hydrofluoric acid. Each contains special carrier materials, water-soluble neutralizers, and pH indicators. Chemizorb® “Specialists” consist of a mineral or synthetic copolymer as the absorbent, and an acidic or alkaline salt as the neutralizer. The admixed pH indicators allow you to visually monitor the neutralization process of neutralization of the spilled acid or alkalis.

### Dosage

The amount of Chemizorb® absorbents needed for alkalis, acids, and hydrofluoric acid depends on the type, quantity and concentrations of the spilled chemical.

Recommended absorbent quantities are provided for different liquids. However, sufficient Chemizorb® absorbents should be added in each case until the spilled liquid is completely absorbed.

**Please note that the reaction may generate heat and gas.**



## Chemizorb® OH<sup>-</sup>

Absorbent and neutralizer for spilled alkalis, with indicator

### Absorbance capacity

100 g  
NaOH 25% requires  
~120 g Chemizorb® OH<sup>-</sup>

### Ordering information

Pack size	Packaging	Cat. No.
1 kg	PE bottle	1.01596.1000

### General information

Suitable for: diluted and concentrated alkalis

### Color change

Blue to pale blue





## Chemizorb® H<sup>+</sup>

Absorbent and neutralizer for spilled acids, with indicator

### Absorbance capacity

150 g  
HCl 25% requires  
~200 g Chemizorb® H<sup>+</sup>

### Ordering information

Pack size	Packaging	Cat. No.
3 L	PE bottle	1.02491.3000
16 L	Bucket	1.02491.9016

### General information

Suitable for: diluted and concentrated acids

Not suitable for: Hydrofluoric acid

### Color change

Red to pale yellow



## Chemizorb® HF

Absorbent and neutralizer for spilled hydrofluoric acid, with indicator

### Absorbance capacity

100 g  
HNO<sub>3</sub> 25% requires  
~160 g Chemizorb® HF

### Ordering information

Pack size	Packaging	Cat. No.
1 kg	PE bottle	1.01591.1000

### General information

Suitable for: hydrofluoric acid, and other diluted or semi-concentrated acids

Chemizorb® HF should be added until a dry powder mixture is obtained.

### Color change

Red to rose

# BE PREPARED

## All-in-one kit for mercury

Chemizorb® Hg is an all-inclusive set of reagents and auxiliaries for safe, complete removal of mercury droplets, and traces of elementary mercury. The reagents included in the kit are sufficient for decontamination an area of roughly one square meter.

### Handling

1. Suction off all mercury droplets using the pipette
2. Empty pipette contents into the mercury bottle
3. Strew a layer of **reagent 1** on all remaining mercury
4. Spray the reagent-covered area with **reagent 2**
5. Allow 15 to 30 minutes' reaction time
6. Using a small shovel and spatula, remove the mercury-containing absorbent and place it in the small tub
7. Wipe away any remaining material
8. Place all tools and working materials into the large can

### Disposal

The mercury-containing material should be disposed of as special waste in accordance with official regulations for hazardous products.

### Features and Benefits

#### Easy-to-use

Kit includes clear, visual instructions for safe decontamination

#### Ready

All reagents and accessories needed are stored in one case

#### Portable

Case's light weight and integrated handle facilitate transportation

#### Safe

Accessories help prevent any contact with the hazardous product



## Chemizorb® Hg

Reagents and accessories for absorption of mercury

### Ordering information

Product	Pack size	Packaging	Cat. No.
Chemizorb® Hg Reagents and accessories for absorption of mercury	1 set	PE case	<b>1.12576.0001</b>

#### Complete kit consisting of

500 g of reagent 1, 100 mL of reagent 2, one small tub, one large disposal can, protective gloves, ...

Product	Pack size	Packaging	Cat. No.
Chemizorb® Hg Reagents refill pack for <b>Cat. No. 1.12576.0001</b>	1 set	PE can	<b>1.01569.0001</b>

#### Reagents refill set consisting of

500 g of reagent 1, 100 mL of reagent 2



Learn more [SigmaAldrich.com/chemizorb](https://www.sigmaaldrich.com/chemizorb)

# Supelco®

## Analytical Products

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