Look!

KH Neochem

in our everyday lives

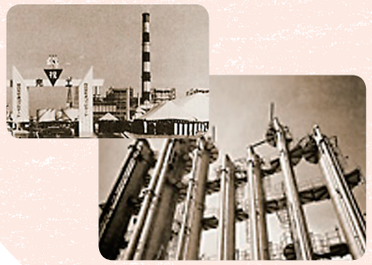
What kind of company is KH Neochem?

We are a chemical manufacturer supporting global production of many items used around the world.

KH Neochem produces chemicals essential in making various products indispensable to our everyday lives. While our materials are hardly ever seen directly, many people use actually products made from KH Neochem's materials.
This pamphlet introduces the "KH Neochem near you".

Q Is KH Neochem a new company?

Our company has been around for seventy years.



KH Neochem's forerunner was Kyowa Hakko Kogyo Co., Ltd., present day Kyowa Kirin Group. In 2011, the chemical business was spun off to form our current company.
KH Neochem Co., Ltd. was listed on the First Section of the Tokyo Stock Exchange in 2016. We became an independent entity recently, but we are actually backed by around seventy years of history and tradition.

Q What are KH Neochem's strong points?

We are the only company in Japan able to make certain materials.

For example, KH Neochem is the only company in Japan able to make isononanoic acid, a special synthetic fatty acid (→ Page 8).
We independently make many high-performance materials and are also one of the few companies in the world able to make cosmetics-grade butylene glycol (→ Page 6).

Q What does KH Neochem make?

We make chemicals important to modern society.

KH Neochem upgrades commodity chemicals derived from petroleum using our proprietary technology to make higher value materials such as industrial alcohols and synthetic fatty acids. These materials are indispensable when making various products including cars, houses, cosmetics, air conditioning and IT devices.

Q What is KH Neochem's product concept?

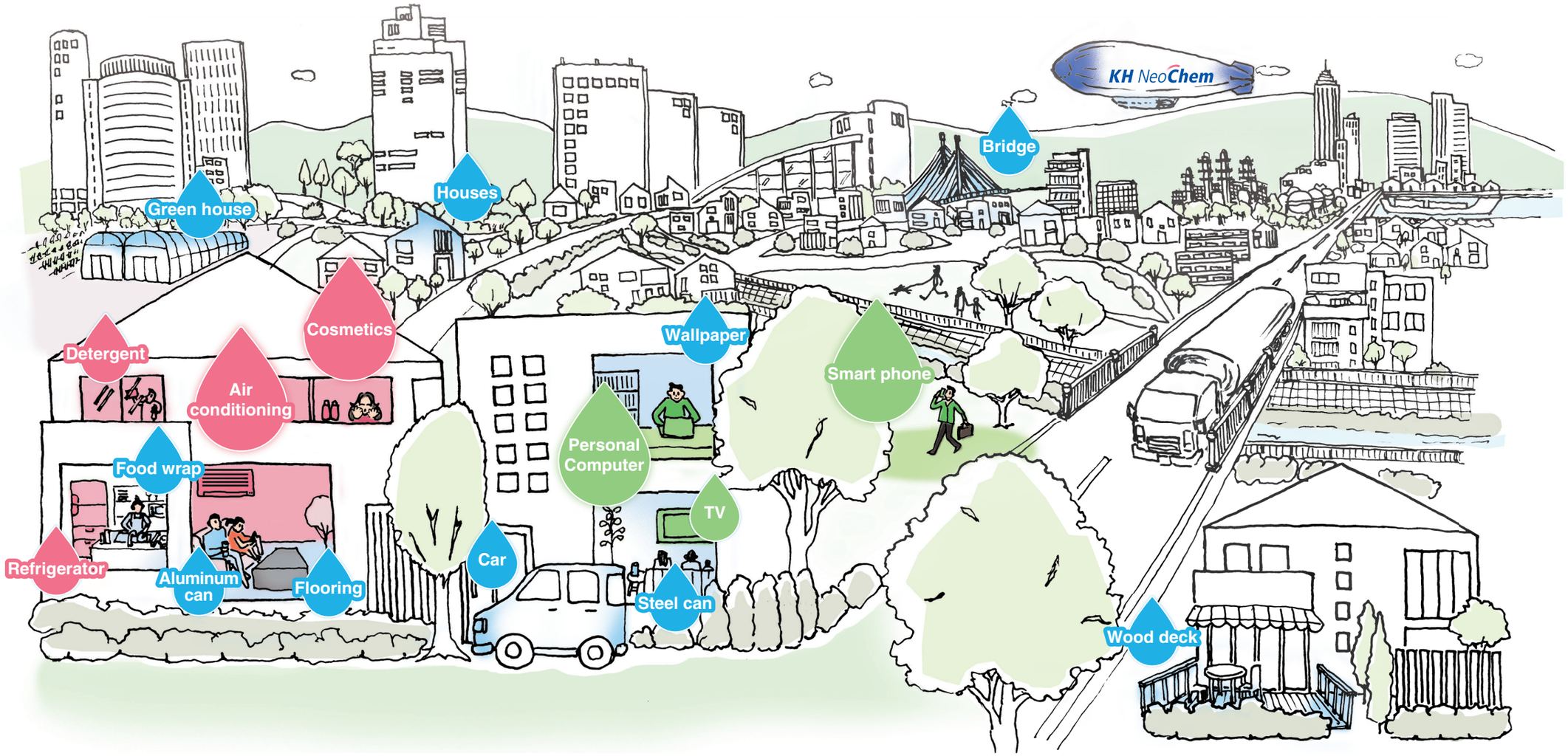
To provide people around the world with a more comfortable lifestyle.

KH Neochem's materials contribute to protection of the ozone layer and prevention of global warming, and we also offer high-quality materials for the rapidly advancing IT industry. We provide our customers across the globe with these types of materials that contribute to helping the global environment and making people's lives more comfortable.

KH Neochem in society

Many items close to you use KH Neochem's materials.

Our chemicals are used as ingredients of various products, including plasticizers which make plastic softer and easier to process, solvents used in paint and adhesive agents, and cosmetic ingredients. Many of the products close to you use KH Neochem materials too.



Cosmetics

Ingredients for cosmetics to keep skin beautiful

Our materials are used as ingredients in skincare cosmetics such as toner and face masks.

→ See page 6 for details

Air conditioning

Raw materials for air conditioning lubricants

Our products are used for lubricants, essential for the effective operation of an air conditioner.

→ See page 8 for details

Smartphones, computers (semiconductors)

Solvents supporting state-of-the-art technology

Our chemicals are used as high-purity solvents necessary to make semiconductors for electronic devices.

→ See page 10 for details

Various products

Contributing to a variety of products

KH Neochem's materials are used for various applications, including car parts, housing material and daily items.

Examples of use

Skin toners　Face masks　Beauty serum

KH Neochem's

cosmetic ingredients

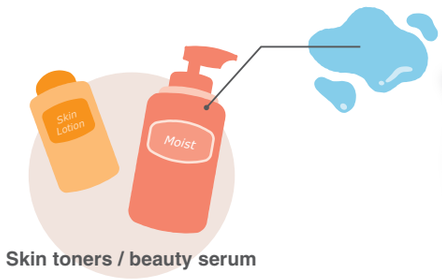
give skin a moist feel

Supporting people's beauty and health

Skincare products are essential for maintaining beauty and health. Due to the fact that these products make direct contact with skin, our products have low skin irritation and maintain moisture over a longer length of time.

Where are our materials used?

1,3-Butylene Glycol provides the moisturizing effect created when using skin toners, face masks and beauty serum. With a high moisturizing effect and the right degree of antibacterial effect, there is little odor or irritation on skin making it an essential ingredient in skincare products.



Skin toners / beauty serum

ZOOM!

Cosmetic ingredients

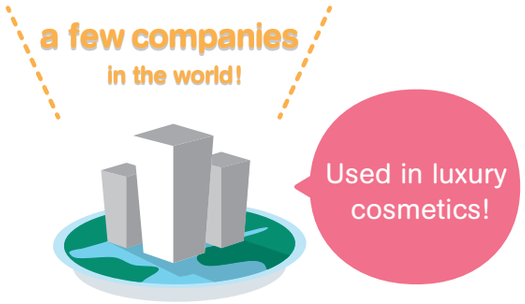
1,3-BUTYLENE GLYCOL

- **High moisturizing effect**
- **Low irritation**
- **Antibacterial**
- **Minimal odor**

This is amazing!

A rare ingredient only a few companies in the world make

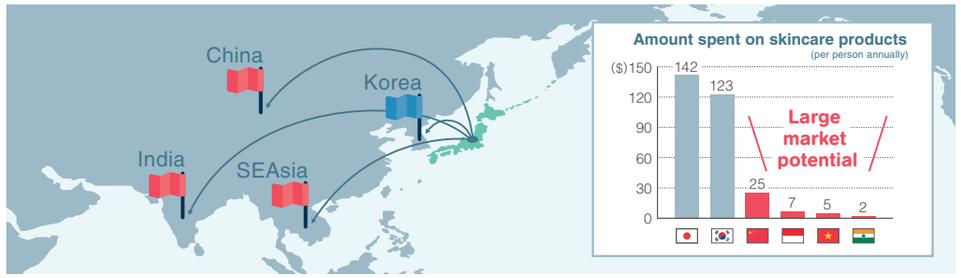
There are only a few companies in the entire world, that make cosmetic grade 1,3-Butylene Glycol, and one of them is us, KH Neochem. Our strength is that since our product is of particularly high quality, it is often used in luxury cosmetics.



CHECK!

Expanding our sales channels around the world

KH Neochem exports 1,3-Butylene Glycol throughout the world. The 1,3-Butylene Glycol market should expand in China, India, and SE Asia driven by growth in their luxury cosmetic consumption.



Source: KH Neochem's estimate in 2019

LOOK!

KH Neochem is even closer

All cosmetics have list of ingredients displayed somewhere on them. If this list includes the description "BG" or "1,3-Butylene Glycol", there is a high possibility that KH Neochem's material is used.
Perhaps even the cosmetics used by you or one of your family members contains our material.

Examples of use

Air conditioners
(outdoor unit)

KH Neochem's

lubricant raw materials

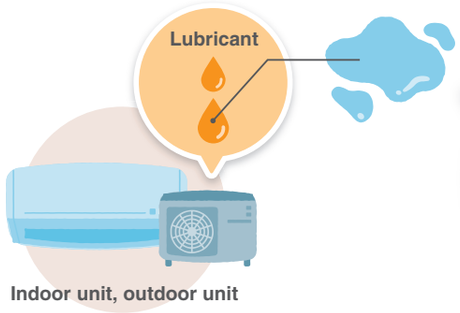
are used for
the efficient operation
of air conditioners.

Supporting a comfortable environment

The demand for air conditioners is growing across the world. They need to be both high performance and environmentally-friendly. At KH Neochem, we make lubricant raw materials which are essential to achieving both of these features.

Where are our materials used?

The lubricant used for the smooth operation of the compressors built into the outdoor units of air conditioners uses KH Neochem's materials. This compressor is a key component of air conditioners as it compresses the refrigerant used to carry the heat inside a room outside.



ZOOM!

Lubricant ingredients

2-ETHYL HEXANOIC ACID

ISONONANOIC ACID

- **Environmentally-friendly**

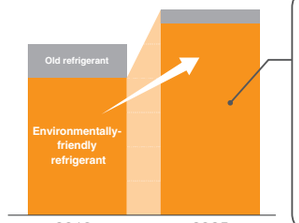
This is amazing!

Supports environmentally-friendly refrigerant
Large market position

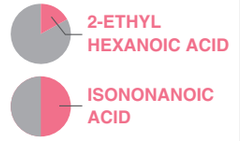
The market for environmentally-friendly refrigerant is expected to grow in the future, even in emerging markets, particularly refrigerants that do not harm the ozone layer and with a low global warming coefficient. KH Neochem's lubricant raw materials have good compatibility with environmentally-friendly refrigerant. KH Neochem is well placed to grow with the market.

Large market position!!

Expanding the market for environmentally-friendly refrigerant



Lubricant Raw Materials global production share



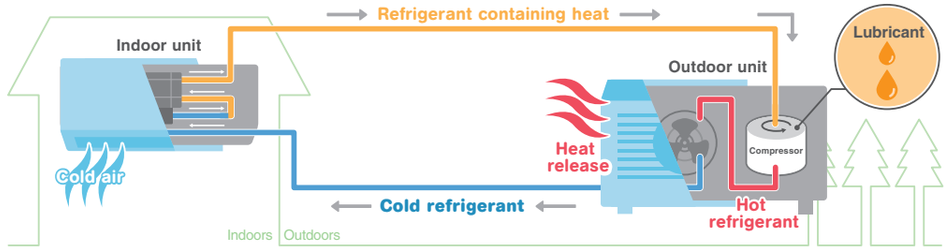
(KH Neochem's estimate)

Source: KH Neochem's estimate based on JARN materials

CHECK!

The workings of an air conditioner – why is lubricant needed?

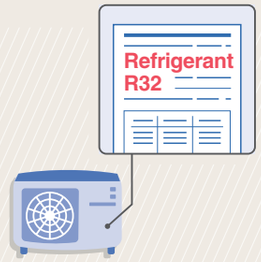
Air conditioners cool a room by taking in its hot air and carrying only the heat outside. The refrigerant that carries the heat outside works by being compressed in the compressor of an air conditioner's outdoor unit. In order for this compressor to operate smoothly, lubricant (refrigerating oil) is needed. Lubricant is truly the core of an air conditioner.



LOOK!

KH Neochem is even closer

Air conditioners have a specification table sticker attached to them. If this table says "R32" or "R410A", there is a possibility KH Neochem's materials are used. R32 is a new refrigerant achieving both protection of the ozone layer and a low global warming coefficient. What do you think the air conditioner in your home uses?



Examples of use

Smart phones　Personal Computers　Semiconductors

KH Neochem's

high purity solvents

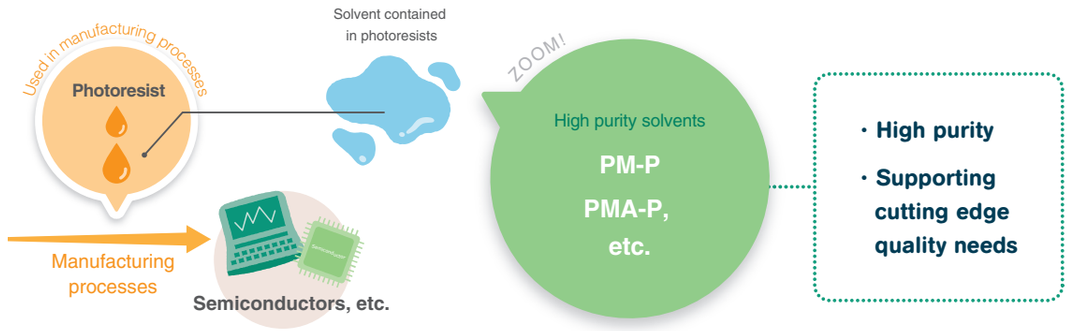
are indispensable for the latest electronic devices

Supporting cutting-edge technologies

The semiconductors used in electronic devices such as smartphones and computers are key to making a device compact and high performance. KH Neochem produces raw materials essential for manufacturing excellent semiconductors.

Where are our materials used?

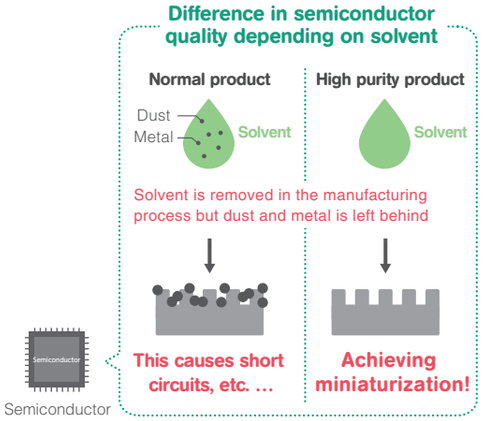
Photoresist is a chemical needed to make semiconductor circuits. One major material of this photoresist is solvent. KH Neochem's solvents have high purity and are essential in making precision semiconductors.



This is amazing!

High purity solvent leveraging the power of the "nano world"

The circuit of a semiconductor is extremely finely adjusted in the realm of nanometers (nm), meaning that short circuits or other problems could arise if the chemicals used in the manufacturing process contain even the tiniest amount of dust or metal. KH Neochem's solvents are extremely high purity to the point where impurities such as dust or metal are removed to the maximum extent. KH Neochem high purity solvents enable the production of modern semiconductors.



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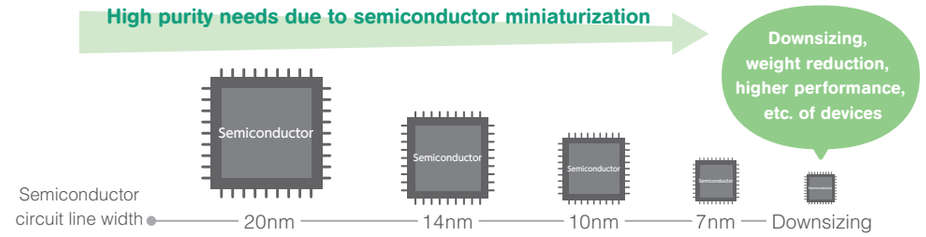
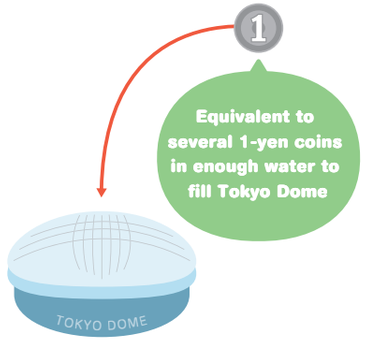
What miniaturization of the semiconductor circuit means

In recent years, semiconductor circuits have undergone a rapid process of miniaturization. Miniaturization promotes the advancement of electronic devices in such ways as downsizing, weight reduction, energy-saving and higher performance.



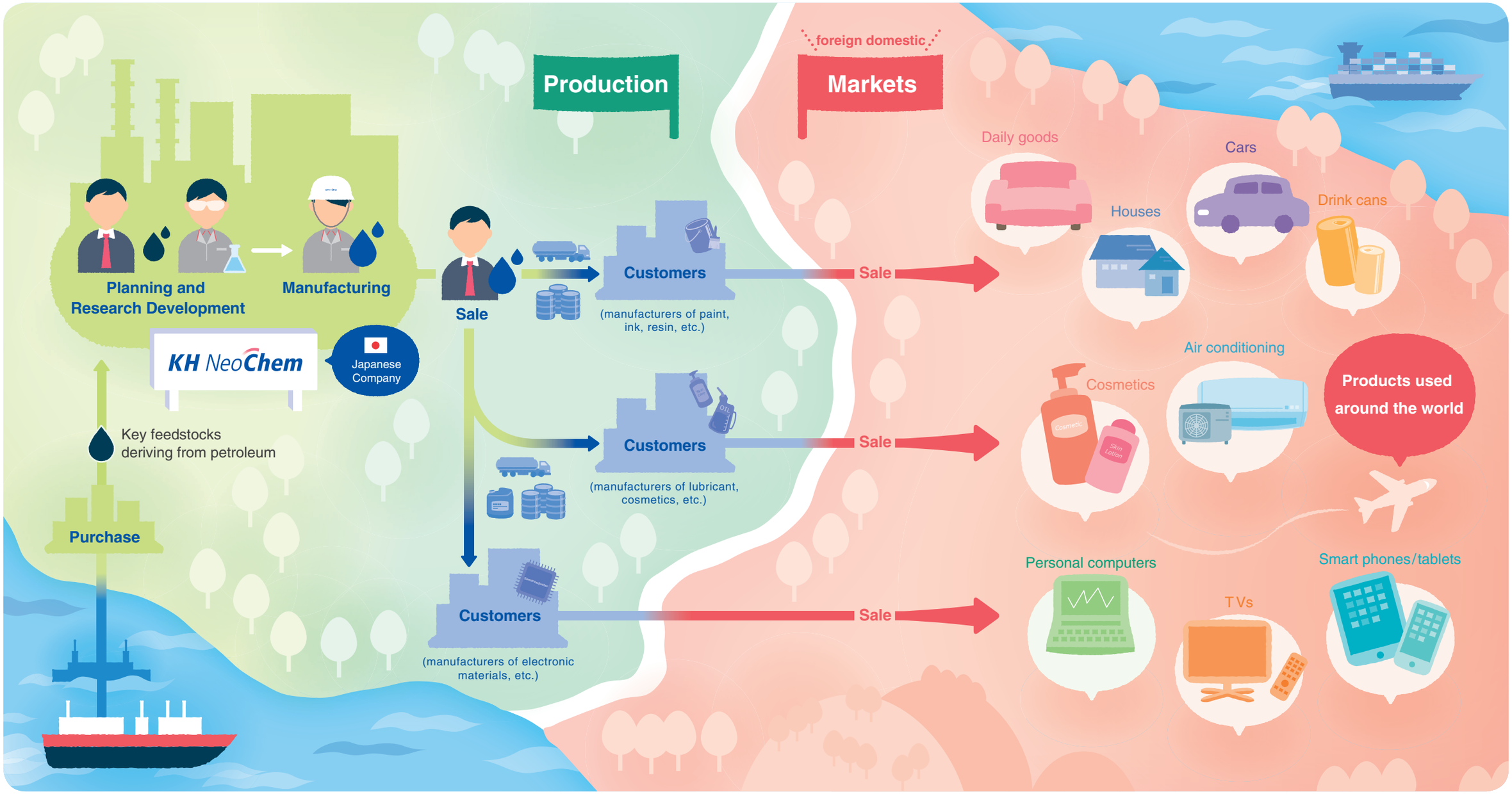
In order to form circuits with finer structures than those of existing semiconductors, there is a demand for ultra-high purity solvent, which minimizes dust and metal to the maximum extent possible.
The control standards are extremely tough, only accepting an impurity content equivalent to several 1-yen coins in enough water to fill Tokyo Dome (A domed stadium in Japan). KH Neochem will continue to rise to the challenge of developing ultra-high purity solvent in order to meet semiconductor miniaturization needs set to increase in the future.



KH Neochem's supply chain until a product is used

We support the manufacturing of the world from behind the scenes.

KH Neochem purchases key feedstocks derived from petroleum from domestic and foreign sources, and uses this to make a wide-range of essential materials with its proprietary technologies. These materials are provided to manufacturers in a variety of areas and play an essential role in making products. KH Neochem supports the manufacturing of the world from behind the scenes.



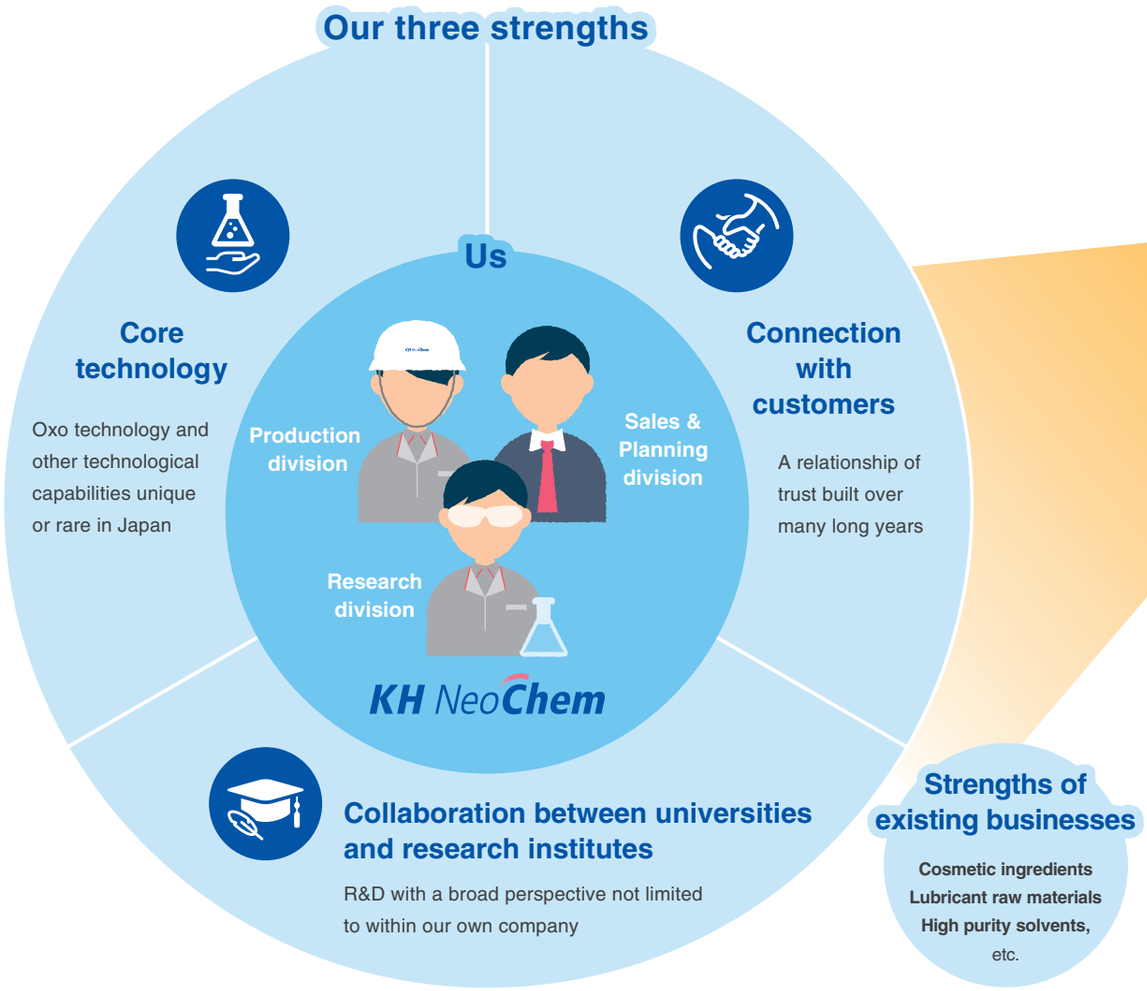
KH Neochem's initiatives for future-generation needs

We challenge ourselves to develop new materials able to solve the needs and issues of society.

KH Neochem provides materials for various markets. We aim to pioneer next-generation solutions based on our core skills, strengths, and understanding of market requirements.

Our challenge for the future

KH Neochem asks itself what it can do for the potential needs of future society.
We offer new materials and solutions for fields anticipated to experience future growth.



Strengths of existing businesses

Cosmetic ingredients
Lubricant raw materials
High purity solvents,
etc.

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KH Neochem Co., Ltd.
URL：www.khneochem.co.jp/en/

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