Cleanit® LC for municipal water treatment

No magic. Just nature.
The green way

Chromium (VI) removal
Arsenic removal
Uranium removal
Selenium removal

Simple, affordable, flexible and 100% green technology
No magic
Cleanit® is an innovative water treatment media, which uses a specially designed media capable of removing multiple contaminants from groundwater and drinking water in a single step. These contaminants include heavy metals like hexavalent chromium or lead and other contaminants like arsenic, selenium, phosphates, and radioactive isotopes.

100% green, simple and cost-efficient
Cleanit® removes contaminants by chemical reduction and physical adsorption processes, widely occurring in the nature. No hazardous byproducts are produced or released during the process. The media also buffers the water pH, eliminating the need of a pH control step, that otherwise requires chemical additives. Cleanit® has operating capacity across wide range of pH-values and flow rates. Typical media life is between 1-3 years depending on characteristics of influent water. We test influent water samples in our labs or through site pilots to give you a good estimate on the life of media.

Once the media is exhausted, we take it back for disposal without any cost for you. Long-term media supply is guaranteed with easy media replacement.

Power of Powder®
Cleanit® is developed and patented by Höganäs AB, a world leader in iron powder established in 1797. We have more than 1.400 customers in 65 countries and offer over 1.500 products from 14 production centers around the world.

We are driven by innovation. By utilizing the endless opportunities of our metal powders, we want to improve resource efficiency and lead a wave of change for the better. That is what we call Power of Powder®.
A green revolution in water purification

Cleanit® is a highly efficient, environmentally friendly solution to remove contaminants from drinking water. It is exceptionally well suited for areas where existing water supplies have been compromised naturally or by a legacy of agricultural and industrial activity.

What is Cleanit®?
Cleanit® is an iron-based media manufactured using leading-edge powder metallurgical technologies. Specialized manufacturing process gives the media a very high surface area and reactivity. Compared to normal zero-valent iron (ZVI) media, Cleanit® offers 10-20 times larger surface area and 10-20 times more reactivity. Thanks to a unique manufacturing process, specialized functional sites are created on the media surface to keep the water pH unchanged, unlike that in the case of normal ZVI media.

“ No doubt, Cleanit is the best solution for Cr(VI) treatment. The pilot went very well, with incredibly low energy consumption and extreme efficiency. ”

Quote from a customer
**How it works**

Cleanit® is most suitable for adsorptive media filter process with up-flow operations. The media is packed in vertical cylindrical columns and water is fed from the bottom. Depending on the contaminant type, concentration, and water characteristics, the empty bed contact time (EBCT) for the filter media ranges from 2 to 30 minutes.

Although the media has a long effective cycle, it can be easily regenerated in the column by using processes such as media fluffing or media reconditioning. After the media is completely exhausted, we take it back for disposal.

**Proven results**

Diagrams below show results from full-scale Cleanit installations in Brazil. Although the drinking water standard for hexavalent chromium is 50 ppb in Brazil, Cleanit process removes the contaminant to non-detect levels.

![Cleanit® LC medium in up-flow column.](image-url)
A win-win partnership

Our goal is to create successful and lasting relationships with our customers. That is why we not only provide you simple, cost-efficient and 100% green solutions but also offer a zero-cost and zero-obligation Cleanit® test module. We provide all the resources. The only thing you need to add is your commitment to delivering affordable, clean water.

Pilot installation at zero cost
We offer to install a pilot plant at your site completely free of charge. This eliminates any financial risks and makes it possible for you to evaluate the performance of Cleanit® without any long-term commitment. The pilot test usually runs 90-120 days with our full technical assistance.

Complete solution at a pre-agreed price
In a second phase, Höganäs offers to design and install a complete unit at a pre-agreed price, paid after performance has been approved by you. Höganäs provides all engineering support for the process along with the technical support and training needed. We also take responsibility for media disposal.
Let’s make every day a water day.

Media disposal
Höganäs accepts the spent media free of charge to the customer. Alternatively, it can be disposed into a non-hazardous landfill.

Cleanit® LC in short

- Effective over a broad water chemistry range
- Reliable performance with low maintenance
- Can be retrofitted into an existing water treatment system
- Cost-effective solution for removal of water contaminants
- 100% environmentally friendly and recyclable
- NSF/ANSI Standard 61 approved

Want to know more? Contact your nearest Höganäs office. You will find all contact details at www.hoganas.com/cleanit

Pilot plant
Zero cost to customer

Full-scale operation
Pre-agreed price after approval of performance

Future
Shared responsibility according to individual agreement
Metal powder technology has the power to open up a world of possibilities. The inherent properties of metal powders provide unique possibilities to tailor solutions to match your requirements. This is what we call Power of Powder®, a concept to constantly widen and grow the range of metal powder applications.

With its leading position in metal powder technology, Höganäs is perfectly placed to help you explore those possibilities as your application project partner.

To find out how you can apply the Power of Powder®, please contact your nearest Höganäs office.