

The Possibilities

Photocatalysis based on titanium dioxide has come a long way from the laboratories and is now a part of our everyday life.

TitanShield is opening up completely new and unexpected opportunities to us. Thus, serious scientific studies show that approximately 1,000 m² of coated facades clean our air as effectively as 70 large deciduous trees. Therefore a decision for TitanShield®, in addition to its economic aspects, is also a decision for active environmental protection.



Our TitanShield® technology is safe, certified and completely environmentally friendly. At the same time, titanium dioxide is completely nonhazardous and food safe. It is already found in many branches of industry as well as in medical and cosmetic applications.

The antimicrobial effect of our TitanShield® products has been confirmed by studies of a certified German test laboratory.

Quality of Life

Light has amazing properties regardless of whether it is artificial or natural. Photosynthesis makes life possible from light and air because life-enabling oxygen comes from carbon dioxide.

Light and oxygen play an important role in photocatalysis, too. Titanium dioxide can activate oxygen and enable many types of microorganisms to be broken up.

As viruses, germs and bacteria are broken up, photocatalysis contributes to an improvement of our quality of life. TitanShield® can be used wherever cleanliness is the measure of all things, wherever unwanted odours occur as well as wherever cleaning is expensive and cumbersome.

TitanShield®

The active investment in a better quality of life!



The Power of Light and Oxygen

With TitanShield® coated surfaces have unique properties. They clean themselves, they are antibacterial and they are even able to eliminate pollutants, viruses and unpleasant odours from our air.

The logo for TitanShield, featuring the word "TITAN" in large, bold, black capital letters with a registered trademark symbol, and "Shield" in smaller, blue capital letters below it. Above "TITAN" are seven small blue squares of varying shades, and below "Shield" is a blue horizontal bar.

Self-cleaning

Clean facades, roofs and windows – only from the power of the sun and rain! This is no longer a vision but a living reality with TitanShield®.

The sun is able to break up dirt particles with TitanShield® so that they can be washed away with normal rain. Very useful - a pane of TitanShield® coated glass stays completely clear and transparent.



This effect is based on super-hydrophilicity, another useful feature of TitanShield®. Instead of building up annoying droplets, the water is distributed as a very thin film on the surface. This promotes evaporation so that the coated surfaces dry very quickly again.

TitanShield® coatings can be applied to many types of surfaces whether they are glass, stone, concrete, metal or plastic.

Air Purification

Nitrogen oxides from car exhaust and industry pollute the air in our cities. They lead to respiratory problems and damage our buildings.



It is an astounding fact that a TitanShield® coated surface is indeed able to effectively break down 85% of these damaging noxious gases such as nitrogen oxides (NOx), formaldehyde, benzene and volatile organic compounds (VOCs).

Indoor area also!

Pollutants in the indoor air of buildings frequently lead to massive physical complaints such as the so-called “Sick Building Syndrome”, the “building-related illness”. TitanShield® reliably and sustainably eliminates the air pollutants responsible for this and for the unpleasant odours in indoor spaces. For this effect as a rule, a simple coating of the ceilings is sufficient.



Disinfection and Hygiene

Bacteria and viruses are dangerous. A TitanShield®-coating creates active oxygen radicals which effectively kill off bacteria and viruses. Even aggressive pathogens such as SARS and H1N1 can be reliably combated upon contact with the coating. This effect lasts for a long time since no resistance is built up.

TitanShield® is used today in hospitals, nursing homes, kindergartens and in health sectors of catering and food production. Furthermore, TitanShield® also protects our health in highly-frequented locations such as sports facilities, sanitation facilities and public transportation systems - and all of this without harmful side effects!

