

Natural Water

Where it all began

or millennia, pure clean water has been central to human existence. It quenches our thirst, nourishes our crops, it keeps us clean. It invigorates and refreshes our body and mind. Crystal clear water flows naturally from springs into streams and lakes teeming with life, before we begin to violate them with pollutants and modern day living.

For most of us, the experience of diving into a body of pure clean fresh water is far removed from our daily lives. Instead we cool off in swimming pools smelling of chlorine. Imagine what it would be like to be able to swim every day in a pool completely free of both chemicals and purification equipment? That's exactly what the BioNova natural pool is about. It is the "swimming pond" concept developed and perfected in Europe over the last decade. These swimming pools rely on nature to purify and balance water, just like it occurs in mountain lakes and streams. A natural swimming pool actually consists of two pools of watera swimming area, and a regeneration and purification "water garden".





Your own mountain lake

BioNova natural pool is like having a natural spring or remote mountain lake right in your own backyard. You can finally swim freely, without worrying about burning eyes or dried out skin and hair. No use of chemicals, no wasted water and reduced energy consumption also make it the ultimate planet-friendly choice. And on top of all that, it's simply beautiful to look at.

The swimming area can look like a typical swimming pool-with plaster, tile, and typical shapes-or sculpted like a small lake. This is linked to the regeneration water garden from which it derives its purified water. The pool and water garden can be close together or completely separate. The water garden consists of a pond with a lush ecosystem designed to purify water. Plants in the regeneration zone absorb nutrients from the water that microorganisms release during the decomposition of germs and organic substances. Water flowing through reeds and roots is biologically and mechanically purified in the underlying sand and gravel filter layers.



Letting nature do the work

he concept behind the BioNova natural swimming pool is simple. A part of the pool is used for bathing while the other part regenerates the pool water. No chemicals are used. The natural, biological purification processes that occur in the water treatment area maintain a quality of hygienic, clean water like that of pristine mountain lakes.

There are two basic BioNova pool systems. In the single chamber design, the swimming area and the regenerating plant zone and soil filter are placed inside a single basin. This is similar to the way a natural pond or lake works with one important difference: The pool construction keeps the swimming and treatment zones apart from each other so that you can swim uninhibited.

In the patented BioNova dual chamber system, the swimming zone and the regeneration zone are two separate basins. This type of system is essential in warmer climates.

Regardless of which system you choose, a number of options are available. Your natural pool is customized to fit your landscape requirements and personal tastes.

Resplendent in purpose

t the heart of the BioNova system is the biological treatment plant. This consists of a lined overflow pool filled with specific filtration sediment and flora. The plants used for water regeneration can be supplemented with water lily, irises, flowering rushes and other blooming water plants. The treatment area becomes an attractive water garden that enhances the garden landscape and invites active nature watching. Microorganisms, microbes and water plants ensure continuous and effective cleaning. Hydraulically optimized soil penetration increases cleaning power further. An efficient pump with minimum operating costs completes the regeneration cycle by returning the purified water back to the swimming area.









Five BioNova systems to choose from

Type 1 - Eco BioNova:

Swimming and treatment zones are built into a single water basin-the "one-pot pool." Half of the pool is available for bathing and swimming. The other half is designed as a soil filter with aquatic plants. Skimmers that can be varied with the water level are incorporated to skim the surface of the water. From there, a pump draws off the pool water and distributes it in the regeneration zone. This is a very reasonably priced model for small gardens

Type 2 - Standard BioNova:

This popular system is also a one-pot pool design. In addition to the tried and tested BioNova soil filter, it includes an overflow gutter to produce a stable water level in the pool during circulation. The especially good water quality is achieved through a two-stage separation of the biomass via a grating and the use of fine filter cylinders. Customers appreciate the Standard BioNova's great value.

Type 3 - Partially Separate Regeneration:

In this optimized system the equalizing tank is replaced by a separate soil filter. An overflow gutter maintains a stable water level in the pool during circulation. Because of the partial separation of the regeneration zones, water to be purified can be directed into the soil filter in a more targeted way. This method of construction increases swimming zone capacity (number of people) and is very economical in terms of water consumption. More space is required for this system.

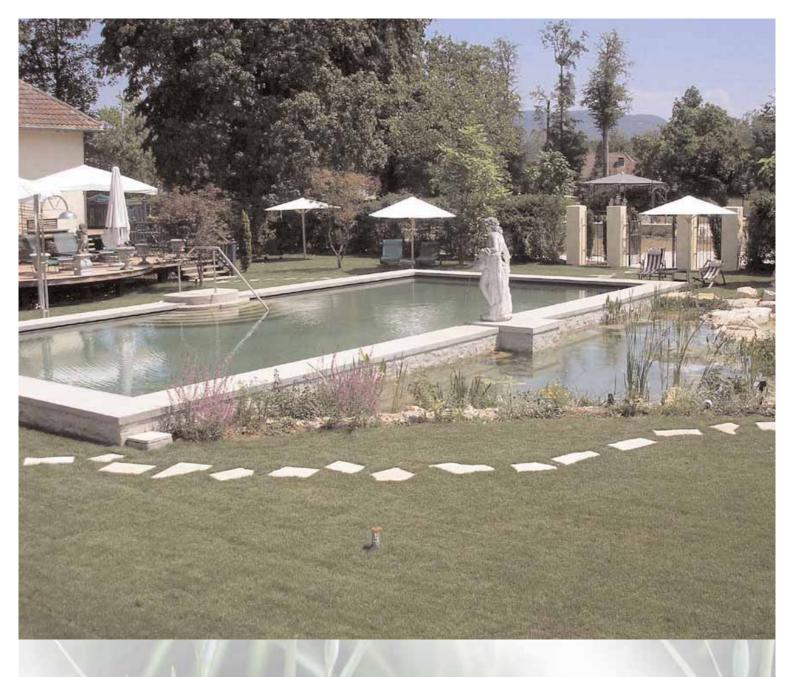
Type 4 - Separate Construction (2-Pot Building Method):

With this building method, which is used predominantly in the public sector, there is no need for any plants in the swimming zone at all. Purification is carried out in separate regeneration ponds.

Type 5 - BioNova Pool:

This method of construction is ideal for those who are looking for a traditional swimming pool with perpendicular walls, but want to eliminate the use of chemicals. The water is drawn off the pool through gutters near the surface and then enters the separate regeneration zone by gravity. The water is then fed back into the pool using pumps. The advantage of this building method lies in the clear separation of the swimming and purification zones. Thanks to an optimized hydraulic system, the purification areas can be reduced and built partly underground. As a result pools can be constructed on smaller plots of land. All pool shapes and types are possible, from a geometric form with an overflow gutter and the hydraulic system of traditional swimming pools to a cliff side basin with separate regeneration. The treated bathing water is re-fed through the ground or using wall nozzles.





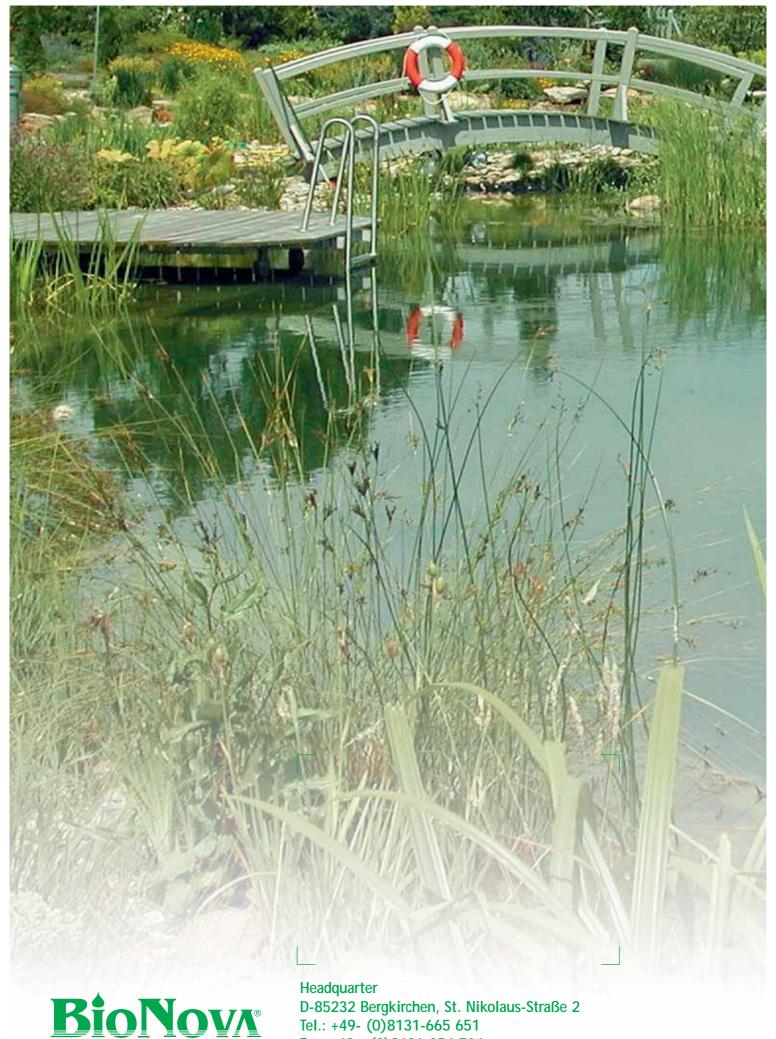
Strictly formal or rock pool

Pool shape and material are freely selectable to meet your individual requirements. Choose from geometric designs, extravagant shapes, solid rocks, stainless steel basins, concrete or even foils for a unique look.

BioNova can transform your traditional pool into a natural one

Natural swimming pool owners stand out from the crowd. Short breaks featuring a high level of relaxation are becoming increasingly popular, with biological treatment making it possible to add a "back to nature" element to the offering.

Trained partner companies in Europe, Israel, Australia and North America provide sales and planning services.





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