



# LIVING-POOL

NATURAL  
LIFESTYLE  
SINCE 1985

# BRING NATURE INTO YOUR POOL!

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## THE POOL FOR A CLEAN CONSCIENCE

More than thirty years ago, I pioneered a new era of swimming and recreation in Austria with the first BIOTOP Natural Pool. Together with my experienced team and our partner companies, we have since built more than 6,000 facilities in Austria, throughout Europe and—in the meantime—all around the globe. In the year 2007, BIOTOP established the first test facility for a swimming pool with chemically untreated water—the Living-Pool. Within a short time, the Living-Pool developed into a sophisticated product, and more than 600 facilities have already been built worldwide. Each one of our Living-Pools is unique and embedded harmoniously into its surroundings.

Our know-how grows with every new facility built. This forms the basis for our offering, which we can confidently call unrivalled—a claim we intend to fulfil in future as well. Professional planning, execution and ongoing customer care, the exclusive use of high-quality system components and our experienced team of specialists guarantee the reliable functioning of our facilities and each customer's lasting enjoyment of their private swimming paradise.

For owners of conventional swimming pools, we have developed the Converter system that allows transformation into a chemical-free Living-Pool at affordable costs.

Embark on an inspiring journey of discovery through the following pages!

DI Peter Petrich



DI Peter Petrich  
CEO of BIOTOP

## CONTENTS

- 1 OUR PHILOSOPHY
- 2 THE NATURAL POOL
- 3 DESIGN POSSIBILITIES
- 4 INDIVIDUAL PLANNING
- 5 TECHNOLOGY
- 6 CONVERSION & REFURBISHMENT
- 7 INDIVIDUAL CONFIGURATION
- 8 MAINTENANCE
- 9 QUESTIONS & ANSWERS
- 10 WHAT OUR CUSTOMERS SAY



**GERMANY**  
A curtain fountain — the perfect addition to a Living-Pool with a modern, clear-cut design.



RESPONSIBILITY FOR  
THE COMING GENERATIONS

# OUR PHILOSOPHY

To dive into pure, clear water completely free of chemical additives, like an alpine lake: Especially on hot days, many people feel a desire for the cool refreshment offered by a pool—preferably in their own garden. But how does one create such a paradise with dreamlike water quality?

It was Leonardo da Vinci who described water as the “blood of the Earth”. It is our most valuable commodity, and we need to treat it with care. As world market leader in the segment of Living-Pool construction, our foremost concern is to preserve this vital resource. For more than thirty years, we have been striving to bring clear, living water—like fresh from an alpine lake—into our customers’ gardens. Always at the cutting edge of technology, we provide long-lasting, crystal-clear swimming pleasure entirely without chemicals. We believe water should be alive, not deadened by toxic additives. Living water regenerates itself thanks to BIOTOP’s technology, and it has positive effects on the body, mind and soul.

With a Living-Pool, you can create your own carefree paradise and a place for everyday natural swimming enjoyment. Detailed planning and individual adaptation to the existing architecture will integrate your Living-Pool perfectly into your garden and create an oasis of well-being.

BIOTOP’s newest development is the Zero Energy Pool, which covers its entire energy requirements using photovoltaics, i.e. through the power of the sun. Measured over the entire year, the facility’s energy balance is neutral, meaning no additional electric power is required to operate the pool.

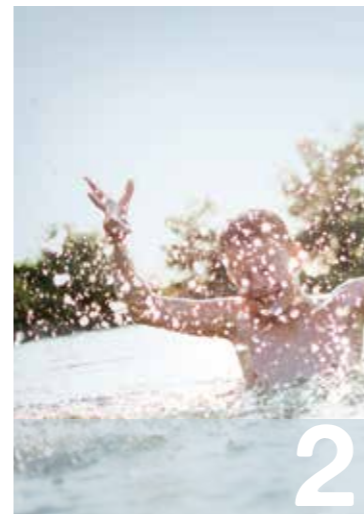




**AUSTRIA**  
Living-Pool in clear, yet eccentric design  
against the imposing backdrop of a  
Tyrolean alpine forest.



**ITALY**  
This extraordinary infinity Living-Pool was awarded 2nd place in the 2015 Design Frog Prince competition.



# THE LIVING-POOL

ENVIRONMENT-FRIENDLY SWIMMING  
PLEASURE IN  
CRYSTAL-CLEAR WATER



## The Living-Pool is the biological variant of the swimming pool

The Living-Pool looks like a conventional swimming pool, but needs no chlorine or other harmful chemicals to provide maximum swimming enjoyment in crystal-clear water.

Instead of the regeneration zone with plants and animals required for a Natural Pool, a subterranean biofilter and the specially developed PhosTec Upstream phosphate filter provide biological and physical treatment of the water in a Living-Pool, maintaining its cleanness and vitality.



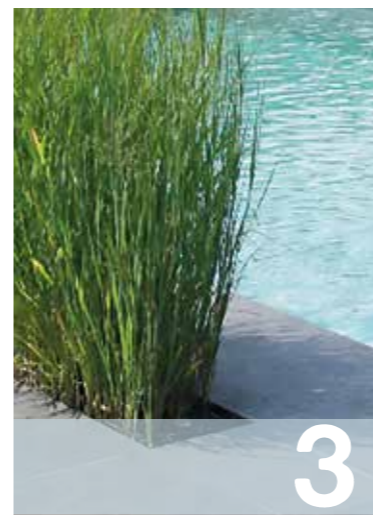
## Advantages of the Living-Pool:

- Good for your health: Biological treatment of the water without the need for chlorine or other chemicals
- Crystal-clear living water at all times with low maintenance & care requirements
- The Living-Pool is filled with water only once and does not need to be emptied every year, thereby reducing water usage dramatically
- Significantly lower energy costs compared to conventional chlorine pools
- Space-saving installation of technical components under the sundeck
- Individual design
- Can be extended to include a separate decorative plant zone





**SOUTH TYROL**  
Distinct lines in harmony  
with nature characterise  
this Living-Pool.



3

# DESIGN POSSIBILITIES

*THE PERFECT POOL  
JUST FOR YOU!*

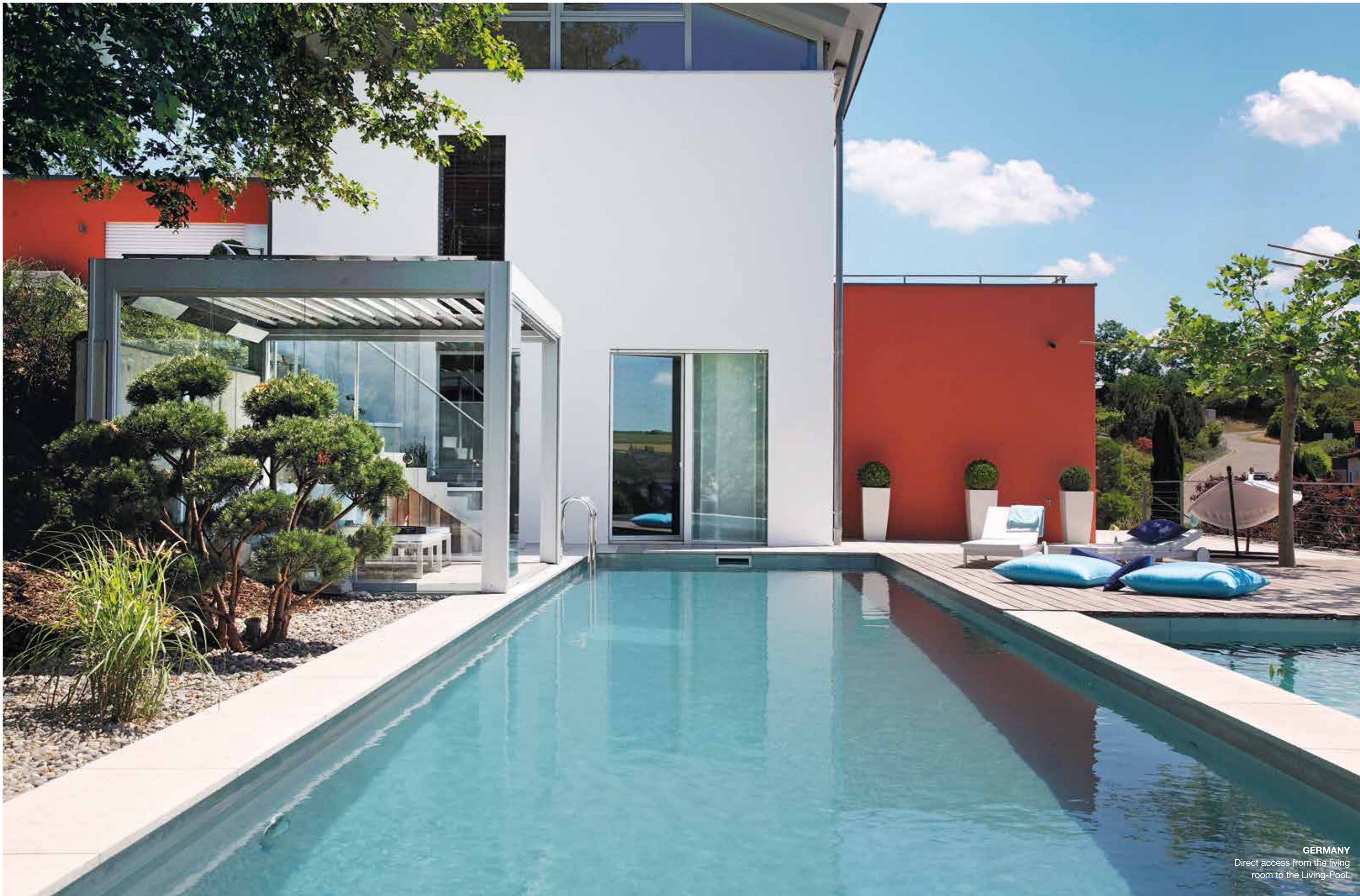
All elements of the design of your Living-Pool can be individually tailored to your needs. The spectrum ranges from minimalistic pools all the way to plant zones created alongside the pool to emphasise the natural character of your facility. Further possible eye-catchers are specially designed basins for water lilies or fish.



**Living-Pool**  
The pure form of the Living-Pool. Looks just like a conventional facility, but features exclusively biological water treatment.



**Living-Pool with separate planted basin**  
If you wish, a separate basin with a plant zone, e.g. for water lilies, can be created beside the swimming pool. The plant basin is completely independent from the swimming pool and forms a separate system.



**GERMANY**  
Direct access from the living  
room to the Living-Pool.



PLEASURABLE MOMENTS  
IN TUNE WITH NATURE

# INDIVIDUAL PLANNINGS

What better way to reflect the unique character of your garden than an individually designed Living-Pool? Regardless of your style, be it classic or modern, the BIOTOP Living-Pool leaves nothing to be desired. Configuration options include counter-current systems, waterfalls, pool heating and many more, all adapted to your personal needs and ideas.

In planning your Living-Pool, we follow the concept of your garden and perfect it into an all-embracing work of art. As global market leader, BIOTOP and the more than 6,000 facilities we have built around the world stand for unrivalled quality and nearly boundless possibilities. In effect, the only limit for the creation of your garden paradise is your own imagination.



## THE PHASES LEADING TO A FINISHED LIVING-POOL

### Consultation and planning phase

Together—and ideally on-site in your garden—we try to concretize your wishes and ideas as precisely as possible so that the Living-Pool meets your expectations and requirements and provides lasting enjoyment.

The following factors play an essential role in this process:

- Usage of the garden
- Circumstances of the site
- Your personal style
- The character of the garden
- Available budget

We take great care—and all the time needed—to collect the necessary data for an initial design and cost estimate. You will be invited to study these documents at your leisure before making changes and discussing the estimate in detail in additional meetings with our planners.



### Construction phase

Following a detailed schedule, our experts will perform the excavation work and build your Living-Pool. This includes all fixtures required for the installation of the technical equipment. Immediately after completion of the construction work, the pool is filled with water and the equipment put into operation. To allow you to use your new Living-Pool as quickly as possible, the surrounding area is returned to its original state or re-fashioned according to the plan.



INDIVIDUAL PLANNING AND QUALITY  
EXECUTION ARE OUR STRENGTHS

### Swimming phase

Your Living-Pool is available for swimming without restrictions during the start-up phase, which lasts several weeks and during which the biofilter system slowly reaches its peak efficiency. Following a comprehensive instruction by your Living-Pool expert, you will receive a handbook containing all the information needed to operate and maintain your facility. Naturally, your expert remains available in person as well for any questions arising during the lifetime of your pool.







**GERMANY**  
Elegant pool design with plants and a curtain fountain.



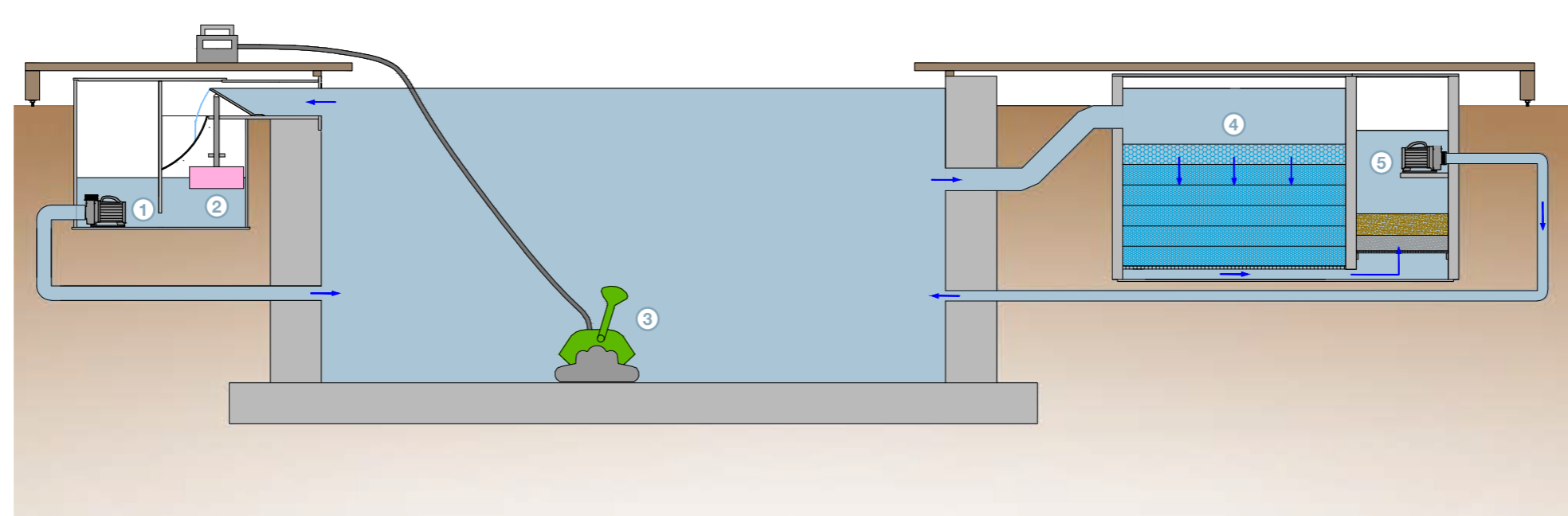
TAILOR-MADE FOR PURE SWIMMING PLEASURE

# 5 TECHNOLOGY

## Two water circuits: Easy to handle

It has always been BIOTOP's intent to make its technical components as simple and easy to understand as possible for the user. The separation into two water circuits allows the pumps to operate economically and with minimal use of space. The first circuit is responsible for cleaning the surface of the water and removing floating particles. Its pump runs exclusively during the day.

The purpose of the second circuit is to eliminate organic compounds and phosphorus from the pool water. Its pump runs continually during the swimming season. Features like rock fountains, waterfalls or curtain fountains can be integrated into either or both of the circuits.



### ① Submersible pump chamber

BIOTOP has developed a special water circulation concept for its Living-Pools. The pump is completely submersed in water in a chamber, allowing water to flow to it simply by the force of gravity instead of being “sucked in” by the pump. Mounted at the bottom of the chamber, the pump conveys the water back into the pool through pressure pipes.

#### Advantages:

- Submersed pumps are very quiet, making almost no noise
- Due to the low noise level, the chamber can be installed underneath the wooden deck
- The pump does not need to be uninstalled for winter
- The pipes do not need to be emptied for winter
- Incoming and outgoing pipes can be regulated individually
- The submersed pump is optimally cooled by the water

### ② Curved screen skimmer

The purpose of the curved screen skimmer is to remove floating particles from the Living-Pool. The water flows over a curved screen with a mesh width of only 0.3 millimetres that removes even the smallest contaminants. A sophisticated mechanism controls the water flow via a flexible flap so that the correct amount of water always flows over the screen. BIOTOP was granted a European patent for this development.

#### Advantages:

- Even the finest floating particles are eliminated from the system
- Nutrients are removed from the water
- The screen is self-cleaning and therefore cannot become clogged

### ③ Pool robot

The pool robot cleans the walls and bottom of the pool basin automatically.

### ④ Bio compact filter

Water flows through the filter vertically from top to bottom and is biologically cleaned along the way, i.e. impurities causing turbidity and organic compounds are broken down by bacteria. The result is crystal-clear water. To optimize the cleaning performance of the bacteria, water flows through the biofilter permanently. The biologically cleaned water then continues into the PhosTec Upstream filter.

#### Advantages:

- Biological cleaning without the need for chemicals
- Requires no electrical power
- The bio compact filter is comparatively small in size and installed under the deck, invisible to the user

### ⑤ “PhosTec-Upstream” phosphate filter

The PhosTec Upstream phosphate filter is installed in every Living-Pool by default. It binds the phosphorus dissolved in the water—which promotes the growth of algae—efficiently and without the use of chemicals. In this way, the algae are effectively “starved”. The water flows through the filter from bottom to top to minimize the risk of clogging the filter, and the nutrient-poor water is then pumped back into the pool by a small pump. BIOTOP was granted a European patent for the combination of the biofilter and PhosTec Upstream filter.

#### Advantages:

- Phosphorus is removed from the water efficiently and reliably
- Small size saves space
- Easy handling
- Simple replacement of the filter material
- Long life span

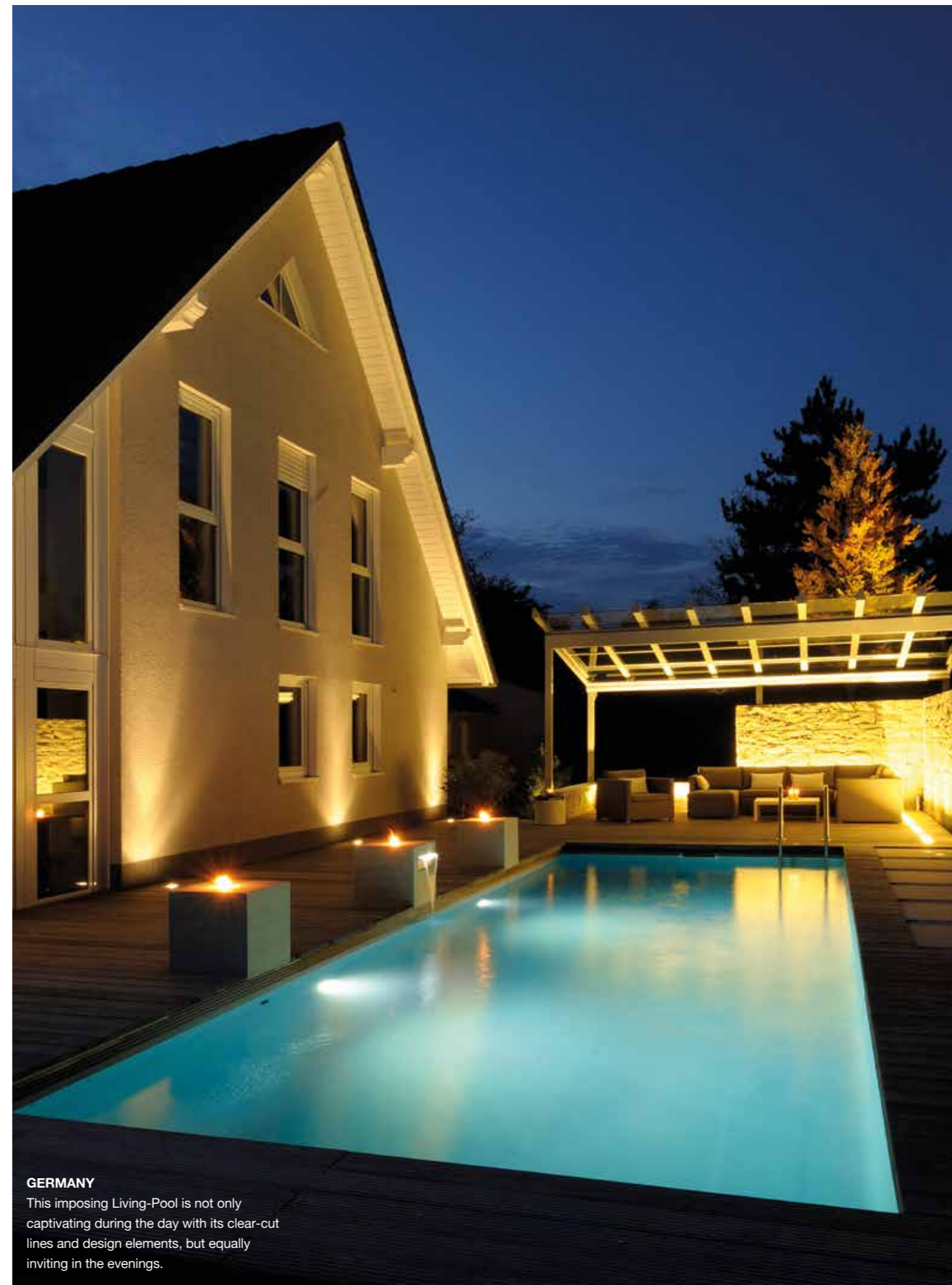
### Combi-Box

The Combi-Box was developed to house all the technical components in a space-saving fashion. It represents a combination of biofilter, phosphate filter and pump chamber. To make installation as quick and simple as possible, all components are assembled and pre-installed into the Combi-Box before delivery.



### Prefabricated basins

The Living-Pool can also be delivered as a prefabricated basin. In this case, we perform the necessary excavation work at the construction site and pour a concrete slab as a foundation. This requires careful planning and precise preparation. The advantages are the comparatively short construction time and a resulting pool with perfectly smooth surfaces and a long lifespan.



#### GERMANY

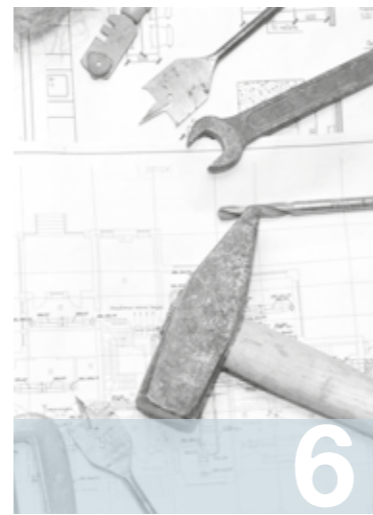
This imposing Living-Pool is not only captivating during the day with its clear-cut lines and design elements, but equally inviting in the evenings.



**SWITZERLAND**  
Pleasing integration of a  
modern pool design into  
a rustic environment.



**AUSTRIA**  
This Living-Pool was built at the BIOTOP head-quarters. It is not only perfect for demonstration purposes, but also provides the BIOTOP staff with refreshment in the summer.



6

# CONVERSION & REFURBISHMENT

*EASY, QUICK  
& NATURAL*



BEFORE



## From conventional pool to Living-Pool

The Living-Pool Converter system makes it easy to convert an existing conventional pool to biological operation. The existing water circuit consisting of skimmer, pump and sand filter can continue to be used; only the chlorination is discontinued. In addition, a Combi-Box housing the biological filter, the PhosTec Upstream filter and a pump is installed. The Combi-Box measures 2 x 1 x 1 metres; it is installed beside the existing pool and a feed and return pipe are attached to it. The pump for the biofilter circuit requires only very little electrical power, and the pool operating costs can thus be reduced significantly through the conversion.



AFTER



**GERMANY**

A good sweat in the sauna followed by a dip in the Living-Pool and a lie-down on the pool patio — pure relaxation.



7

# INDIVIDUAL CONFIGURATION

FOR EVERY LIFESTYLE & ADAPTED TO YOUR HOUSE AND GARDEN

## Selected materials enrich your Living-Pool

Be it an exclusive pool cover, an exquisite access staircase, solar heating or a heat pump: Only the finest materials are used for your Living-Pool. In addition, our offering includes underwater lighting, solar-heated showers and much more. Let your fantasy run wild and choose accessories that satisfy your every need.



POOL COVERS



SOLAR HEATING & ENERGY



UNDERWATER LIGHTING



STAINLESS STEEL LADDERS



STAINLESS STEEL STAIRS



SHOWERS



WATERFALLS AND STEPPING STONES



LIGHT GREY LINERS



DARK GREY LINERS



WATERFALL



COUNTER-CURRENT SYSTEMS



STONE STAIRS

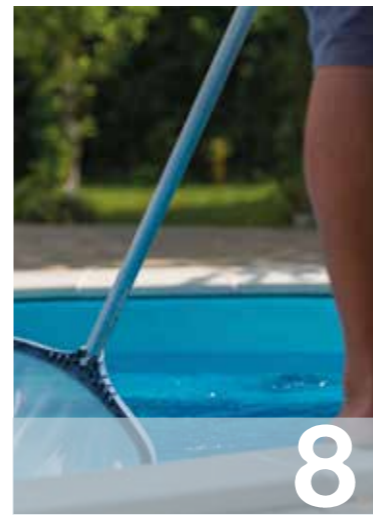


OVERFLOW DRAINS





**AUSTRIA**  
This pool was integrated into the garden to match the architecture of the house.



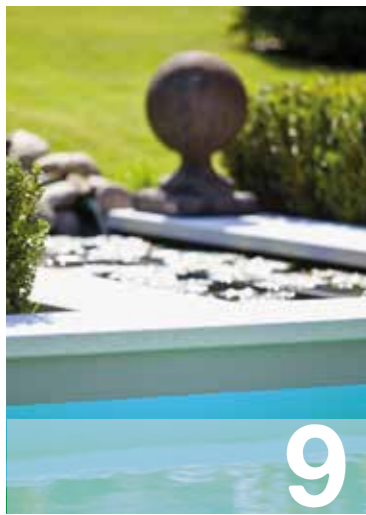
# 8

# MAINTENANCE

Appropriate maintenance is essential to maintain ideal water quality in a Living-Pool. The walls and bottom of the basin can be cleaned automatically by a pool robot or by hand using a special brush. If your pool has a separate plant zone, the plants should be cut back every year. Preparing the system for winter is a quick and simple task—for additional information, please consult our “Spring & Autumn Service” info folder.

Your BIOTOP Partner will be happy to perform the regular maintenance activities for you, from preparing for winter to starting up your facility in spring. It's one of our many ways to help you enjoy your swimming paradise. Quick and easy instructions for starting up your Living-Pool yourself are provided in our service videos, which you can watch on our website.





# QUESTIONS & ANSWERS

9

## Is the BIOTOP Living-Pool hygienically safe?

The water in a BIOTOP Living-Pool conforms to all legal hygiene regulations and standards. Publicly used facilities are subject to strict legal threshold values in regard to their hygienic water quality. While these regulations do not apply to privately used facilities, you may safely assume that your Living-Pool meets the same water quality standards. What is more, scientific examinations performed internally by BIOTOP have confirmed our pools' excellent water quality.

## Why is a Living-Pool better for the environment?

A BIOTOP Living-Pool uses no chemicals that pollute or burden the environment. Its energy and water usage are also much lower, since a Living-Pool is only filled with water once—in contrast to a conventional pool, which needs to be filled every spring and emptied every autumn, thereby releasing thousands of litres of chlorinated water into the environment.

## What requirements must be met for the construction of a Living-Pool?

Ideally, you should have a level (or gradable) area of at least 40 to 50 m<sup>2</sup>; whether it is in the sun or shaded is immaterial. Each facility is individually planned and adapted to the circumstances of its site.

## What kind of maintenance will I need to perform and how much effort will it take?

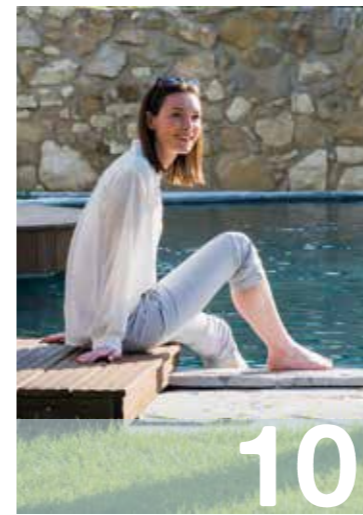
Since the water is not disinfected, a natural biofilm develops on the walls of Living-Pool. This biofilm is removed automatically by a pool robot that needs to run daily. Any areas that the pool robot cannot reach will need to be cleaned by hand occasionally using a brush. Preparing the pool for winter is a quick and simple task, and around a half hour of work is required to start up the system in spring. These tasks can also be performed by our service teams, however.

## Can a Living-Pool be heated?

A Living-Pool can be heated to a comfortable swimming temperature, e.g. by means of a solar heating system mounted on the roof of a garage, garden shed or the like. A heat pump or heat exchanger can also be used. In addition, a pool cover helps to prevent temperature loss.

## How often do the components need to be maintained?

The system is very uncomplicated and requires little maintenance. The pool and piping do not need to be emptied over winter, nor do the pumps need to be uninstalled. Only the filter material in the PhosTec Upstream needs to be replaced every few years, and the biofilter cleaned once per year. You can perform these tasks yourself or commission us to do them for you.



10

# WHAT OUR CUSTOMERS SAY

“Thanks to our Living-Pool, our garden has become an oasis in the middle of the city, and the entire family’s Living-Room in summer.”



“Being nature-loving people, we wanted a pool without chemical water treatment, but still wanted it to have the traditional pool character. This made us decide on a Living-Pool, and it enriches our life every day!”

“In my dreams, I always had a house by the water. The Living-Pool finally enabled me to make this dream come true.”





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