

Simple solution to prevent cyanide accumulation

With just four components, you or your installer can modify your system. Modifying the system is as simple as switching to a freshwater pool that uses saltwater pool technology. The chemical composition of the pool changes completely to that of a saltwater pool. From now on, you will be working with the same inorganic chlorine as in a saltwater pool, which is produced in factories with large electrolysis installations. In fact, you will then have a saltwater pool without salt.

What changes:

You or your pool maintenance technician are used to using PH+. That is no longer necessary.

So inform your pool maintenance technician when you switch.

From now on, you will be using PH-. There are two ways to do this: 1 with tablets (dry acid), which is safer. Or with liquid PH-. Be careful, this is a strong chemical. Do not handle it carelessly! Swimming pool maintenance technicians are used to this and familiar with it.

As with a saltwater pool, you or your pool maintenance professional should add a little (TA+) (not PH+!!) about twice a year to increase the alkalinity, after measuring the alkalinity. This material is usually sold under the name 'sodium bicarbonate'. Please note that not all pool maintenance professionals and swimming pool shop staff are aware of this!

Because the pH in this type of pool always rises rather than falls (as in a tablet pool), the risk of acidic water (due to poor maintenance) and therefore damage to your pool is much lower.

If your pool maintenance company does not maintain your pool properly from now on, the pH will rise and the pool will turn green. You will therefore notice poor maintenance much more quickly.

This is preferable to damage (to joints and tile adhesive) to the pool.

Disadvantage of a 'saltwater swimming pool without salt': lugging around tanks of liquid chlorine. This type of inorganic chlorine comes from electrolysis in the region, is cheap but takes up a lot of space. We recommend that you use a delivery service. The volume for a 50 m³ swimming pool is estimated at 15 tanks per year x 20 l (theoretically only about 12 for 50 m³).

For the pool attendant:

Please note that they often do not want to carry heavy loads. The price usually includes chemicals. It is better to agree that these are not included and to have the chlorine delivered by a chemical delivery service. These are available. In any case, Rosello in Benissa at the Rosello pumping station (they also deliver in Javea). The dosing pump usually does not switch off during backwashing. In that case, hang up the attached warning for the pool man and yourself. It is better if the dosing pump is not running during backwashing.

What happens to the cyanuric acid that is already present?

Backwashing will automatically dilute or reduce the CYA. A second interesting fact that almost no one knows is that research has shown that liquid chlorine is one of the few substances that breaks down cyanuric acid to a small extent. The 'backwash effect' is expected to double. Theoretical calculations predict that your CYA will be at the desired level once as many years have passed as the water is old. This can happen much faster, but there is no scientific research or evidence to support this yet. However, practice will now show exactly how quickly this happens. You can accelerate the decrease in CYA by changing the water more often, for example by using your storage water for replacement during heavy rainfall.

Finally:

For optimal swimming pool enjoyment, purchase a good test kit that can also test cyanuric acid and alkalinity, or even better, a photometer (much more accurate). For example, Poollab 1.0 (simpler) or version 2.0.



Geya GRT8-B1
sharp price!

OR



Finder type: 80.01.0.240.000
High Quality “Rail Way Timer”

+



Push button type: NO (many brands available)
for one-time extra chlorine dose
for taking out air of hose (priming)

OR



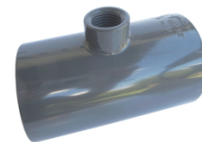
Place a mini version,
if not enough space
in electric cabinet.

+



sharp price!
saddle 3/4” output

OR



Most durable Quality
3/4” output
(more work)

+



Astral Bomba Peristaltica
4 l/h art nr: 57179

OR



Astral Bomba Membrana
type Astral:
Acqua Dos Analog type **B 8 l/h !**

Timer (special time clock)

The Finder timer is a special (inexpensive) timer that is widely used in the railway industry. Its cheaper Chinese counterpart, the Geya, has copied the connection contact numbers.

The clock is placed behind the pump's regular timer (behind the pump protection, so parallel to the pump). Every time the pool pump turns on, the dosing pump runs for the set number of minutes. The number of minutes on this special timer is set once. It is important that the regular existing swimming pool pump timer is set to run 4 to 8 times a day. Use the rotary knob on the dosing pump to set the desired amount of chlorine during the seasons.

Connection to existing pipes:

There are various ways to connect to the existing pipes.

A very interesting option is to install more T-pieces (3 pieces on the return pipe) when tinkering with the pipes in case of installing a T-piece. For making the installation fully automatic in the future (then 1 T-piece is still missing on the supply pipe).

** This installation method can also be used as a bridge for fully automatic installations that cannot yet be put into use until the cyanide level has dropped below 50 mg/l. The ORP chlorine sensor does not function properly if the cyanide level is above 50 mg/l, i.e. in a former tablet pool.

Dosing Pump selection:

Peristaltic Astral 4 l/h item no. 57179:

There are several brands of pumps that can be used. However, they must be approximately 4-6 litres per hour and have an adjustable dial!

The Astral peristaltic pump has a dial that allows you to easily set the chlorine dosage from 10% to 100%. This pump is silent.

Disadvantage of the peristaltic pump: as a preventive measure, the white hose in the pump should be replaced every year (wearing part). In practice, it usually lasts more than 2 years. It is recommended to have a spare hose ready for next year. The pump is self-priming, even if you are late changing the tank.

In the case of the 'Astral Acqua Dos Analog' (diaphragm pump), there is a fine-tune setting that allows the pump to switch to a maximum of 1.6 l/h instead of 8 l/h. This makes it extra useful for winter settings and in combination with a pool cover. With this diaphragm pump, the diaphragm (which does not have a wearing hose) lasts much longer. The disadvantage of this pump is that when the tank is empty for replacement, it sucks air into the hose. However, it has a very simple vent, but don't forget to mention this to your pool man! If you find this an insurmountable disadvantage, choose the peristaltic pump. This Acqua Dos pump makes a noticeable ticking (pulsing) sound, which is usually not a problem because the pool pump also makes a lot of noise. We estimate only a little price difference with the peristaltic pump.

All necessary items are
being supplied by both pumps
Hoses, single direction valve
and tank filter



Electric Installation manual

Connecting Railway Timer

Connect Pins A1 and A2 to the output of existing Pool pump protection (parallel to pool pump).
Connect Neutral N (blue) to A2 and connect phase wire to A1

Place a bridging wire from A1 (phase) to pin 15

Connect Neutral(blue) to the Neutral (blue) of dosing pump

Connect the output of railway timer pin 18 to the phase wire of the dosing pump

Connecting Pulse Button:

Installation of pulse button for extra 1 time chlorine dose or taking out air of hose

Connect the 2 wires from the (NO)pulse switch to pin A1 or 15 and pin S of the Railway timer.

Safety warning:

When you combine this installation with a automatic ph correction, you need a flow sensor protection to avoid liquids get mixed.

Manual de instalación eléctrica

Conexión del temporizador ferroviario

Conecte los pines A1 y A2 a la salida de la protección de la bomba de la piscina existente (en paralelo a la bomba de la piscina).

Conecte el neutro N (azul) a A2 y conecte el cable de fase a A1.

Coloque un cable puente desde A1 (fase) al pin 15.

Conecte el neutro (azul) al neutro (azul) de la bomba dosificadora.

Conecte la salida del pin 18 del temporizador ferroviario al cable de fase de la bomba dosificadora.

Conexión del botón de pulso:

La instalación del botón de pulso sirve para administrar una dosis extra de cloro o para extraer el aire de la manguera.

Conecte los dos cables del interruptor de pulso (NO) al pin A1 o 15 y al pin S del temporizador ferroviario.

Safety warning!

When you combine this installation with an automatic ph- correction, you need a flow sensor protection to avoid liquids get mixed.



Por Favor
Durante Lavado
Filtro
(“Backwash”)
cerrar dosificador
cloro