



'innovative design, precision engineering and quality production'

Coverstar

Automatic pool cover

Why Coverstar?

Based in Utah, USA, Coverstar are the key manufacturer of automatic safety covers today. Their cover system has developed through many years of innovative design, precision engineering and quality production.

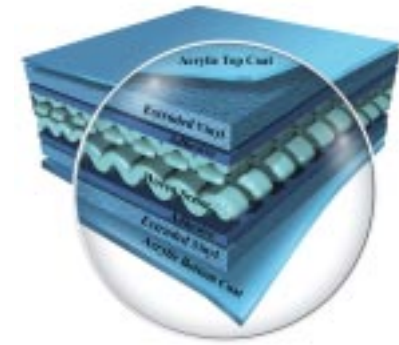
Mechanical Benefits:

The Coverstar system is based on strength. For example, the sliders, which are traditionally the weakest part of a cover system, are more than four times as strong as any other slider used in the industry.

Coverstar's exclusive heavy-duty double row sealed stainless steel ball bearing pulleys have almost triple the load bearing capacity of single row pulleys used by other companies. In addition, the exclusive rope has a breaking strength of 2,200 psi, twice that of standard Dacron ropes.

No sheer pins or bolts are used in the Coverstar drive train, instead the system operates with keyways to provide maximum reliability. Within the drive train, Coverstar's exclusive Positive Shift Gear system completely disengages one gear before shifting to the other.

Unlike other systems, it cannot double engage causing the system to try to run in both directions at the same time, causing gears to wear and slip. To top it all, the surrounding and connected heavy-duty frameworks and brackets are fully expandable, ensuring the most solid fixing and eliminating bent and/or broken brackets. Once the system is locked into place, it cannot move around.



Fabric
Long lasting
20 ounce acrylic
coated vinyl

Fabric Benefits:

All of the this would be worthless without a good quality fabric to cover the pool. Rather than use the industry standard vinyl's, popular with other cover manufacturers, Coverstar supply the far superior Ultragard II vinyl composite in a range of colours. Ultragard II offers the best solution available to problems posed in safely covering a pool in current harsh environments.

For those times when we do get sunny periods, you can be assured that the high level of UV resistance offered will reduce the level of colour fading considerably as compared to standard vinyl. Under test conditions, Ultragard II has been exposed to the equivalent of approximately four years of Florida sun and fading was shown to be negligible. This fabric also offers high resistance to chlorine, acid, ozone and other pool chemicals.

In addition, Ultragard II is extremely tough. An acrylic coating on the underside means that the fabric has a high resistance to abrasion, i.e. dragging the cover over a deck surface surrounding a pool is not a problem. Incorporated within the fabric is a double yarn rip stop travelling both down and across the material. As well as helping to prevent shrinkage, this weave stops any tears or punctures which should occur from growing larger. All in all, Coverstar Ultragard II is the ideal pool cover fabric.

Available in a wide range of colours.



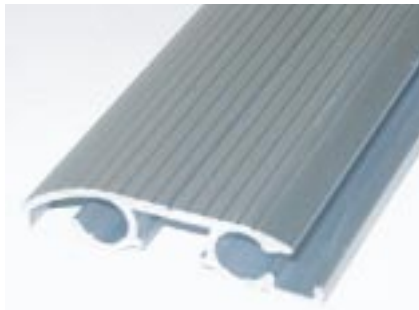
Due to limitations in the printing process the colours above may vary slightly and are for guidance only.



Cover Systems

Deck-Mount.

This is a fully above ground system. The mechanisms and guides are secured to the deck surround of the pool. This is the most common form of retrospective fit cover as no alteration is needed to the pool surround providing it is solid and level. When fitted the roller is visible. The mechanisms at either end of the roller can be covered with white housings if required (at no extra cost), or you can independently construct your own design of housing such as those pictured. Along with the following two system options and because guides are secured to the deck, almost any pools shape can be covered.



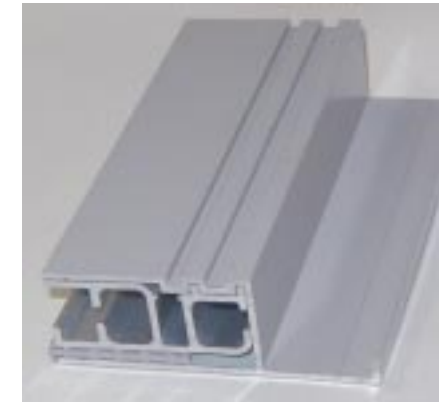
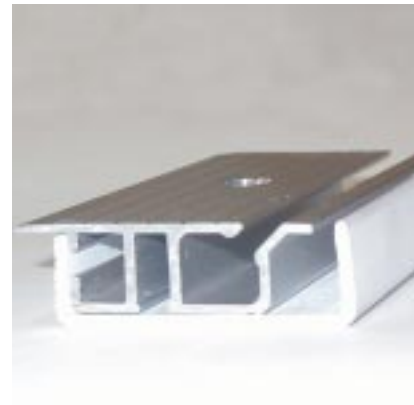
Recessed Top-Guide.

The same guide set up as the deck-mount, but all the mechanisms are recessed into a pit for a neater appearance. A pit lid can be supplied if required (again at no extra cost). This is an aluminium lid which covers the pit neatly and allows access to the roller and mechanism. Your own independent design can be introduced if you wish.

Horizontal Flush-Guide (Deck or Recessed).

Flush guides sit in channels recessed along either side of the pool, leaving a flush finish. Generally the guides sit behind copings on a rectangular pool, but again, as this is a deck guide system almost any pool shape can be covered.

Mechanism and roller can be deck mounted or recessed into a pit.



Under-guide.

These systems offer by far the neatest finish for rectangular pools. The guides can be suspended under a coping stone (if suitable) - known as standard under-guide, or can be built into the pool wall while under construction - known as encapsulated under-guide. The track is virtually hidden and the pool is sealed from the pool wall not the surrounding deck. All mechanisms are recessed into a pit and can be covered with the standard aluminium lid.

Basic Specifications

Deck Mounted Systems.

- The mechanism and guides need to be set square to the pool and create a pure rectangle.
- The guides must extend past the end of the pool by a minimum of 18" to allow a good overlap of the cover.
- The mechanisms/roller should be set back 18" (457mm) from the front of the pool to limit any cover drag over the deck. In special cases the roller can be set back further. Please check with your Coverstar dealer.
- The motor end mechanism will extend 30" (762mm) from the inside of the guide at the motor end. The non-motor end mechanism will extend 10" (254mm) from the inside of the guide at the non-motor end.
- Top-guides are 2.5" (64mm) wide and 0.5" (13mm) high.
- The leading edge beam will need a

clear space of 6" (152mm) above deck level in order to travel the length of the pool cleanly.

Recessed Top-Guide Systems.

As with the Deck Mounted systems but with the following additional requirements for the pit.

- On covers up to 45' (13.5m) a pit 12" (300mm) wide x 12" (300mm) deep must be constructed. For larger covers please call your Coverstar dealer for further details.
- The motor end of the pit needs to extend a minimum of 30" (762mm) from the inside of the guide. At the non-motor end the pit should extend at least 10" (254mm) from the inside of the guide.

Under-guide Systems.

- The pool must be a pure rectangle with square corners.

- On covers up to 45' (13.5m) a pit 12" (300mm) wide x 12" (300mm) deep must be constructed. For larger covers please call your Coverstar dealer for further details.
- The motor end of the pit should extend 30" (762mm) from the pool wall. The non-motor end of the pit should extend 10" (254mm) from the pool wall.

- If the guide is to be suspended from a coping cantilever there should be a 2" (50mm) flat overhang and any hollows should be grouted solid for extra strength.
- Encapsulated guides should be installed during construction of the pool.





What Do I Get?

Each system includes:

The Ultragard II cover with ropes; the guides with all pulleys, sliders and stops; all tubes, rollers and wheel assemblies which support the cover; the complete drive mechanism specific to your requirements (i.e. whether deck or recessed, right or left hand). The hydraulic power pack, hoses to connect to the drive mechanism and 10 litres of hydraulic oil. Controlling key switch and two keys.

A Coverstar submersible pump to place on the closed cover to draw off any gathering rainwater. This is complete with a mesh bag to protect the pump from debris, and cable to connect the pump to the mains, but does not include lengths of hose to disperse the pumped water.

Depending on which style of system you order, you can have, one of two methods of covering the mechanism.

For deck mount systems Coverstar provide white fibreglass housings for the motor and non-motor end of the roller. These housings screw to the deck securely and keep the mechanisms safe, clean and out of site. The roller and covering material is left on view.

For recessed (pit installed) systems an aluminium lid with brackets is included in the cost. This is a hinged lid allowing access, in three parts, to the roller and mechanism below. The hinge is attached to the deck and the lid rests on angle brackets mounted in the pit.

Finally, the homeowner receives a small pack containing guidance on using and maintaining the system and cover pump, along with a video instructing the user on the systems benefits and methods of operation.



Options



Cover operation:

Coverstar is simple to operate via a key switch. When not in use the key can be removed preventing unauthorised operation.

Installation:

A team of fully trained engineers can install your system if required. Usually done over two days depending on location, this service is offered for all types of systems provided. Alternatively, written instructions are provided if you wish to complete your own installation.

Heavy-duty systems:

If you have a pool for which a cover over 25' (7.62m) wide and over 50' (15.24m) long would be required, a heavy-duty system can be produced. Separate quotes for the system, delivery and installation must be sought.



Optional extras

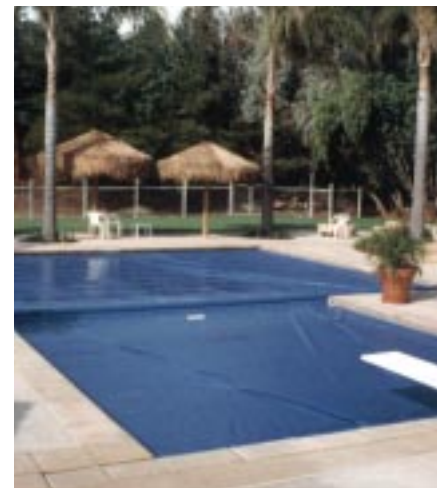
There are many ways in which the standard system can be adapted or enhanced for your specific needs. If you are interested in any of the options listed below please call your Coverstar dealer for a quotation and further information.

Pit lid trays:

Rigid brackets are available upon which paving can be directly laid. Alternatively, pit lid trays can be supplied to hold a more decorative and varied finish.

Double coverage:

Coverstar systems can cover almost any shaped pool, if not with one cover, then possibly with two! A double coverage system uses two covers at a convenient meeting point. As with the example shown, this now means that awkward shaped pools, such as 'L-shaped' pools and 'T-shaped' pools, can be covered safely.



Basic operational instructions

Important Safety Issues: Although a safety cover, the Coverstar is only safe when used correctly. Never allow children to play with or operate the cover unless closely supervised.

Whenever the cover is closed, the cover pump should be in place and set up for use; even a small quantity of water gathered on the covers surface can be a hazard. Always retract or close the cover fully, a half open cover is extremely dangerous.

Finally, although the closed cover will take the weight of many adults, it is never recommended that anyone should play on the cover.





Common Queries

Many queries are raised before and after the installation of any cover, as is natural with a large project. Some of these are addressed in advance below.

Slack in the cover material:

All fabric covers, such as the Coverstar, are manufactured with a quantity of slack relevant to the pool size and style of cover system. There are several reasons for this.

1. A cover that is too tight will pull against the tracks and will not operate properly. A cover that is made too small reduces the life of the cover and mechanism, causing premature failure of both the fabric and the mechanism due to the added stress.
2. All fabric shrinks over a period of time. The amount of the shrinkage varies widely according to the type of fabric, how the fabric is

manufactured, the temperature of the water, and the weather conditions. Slack is added to the fabric to compensate for fabric shrinkage.

3. The cover must lie on the water in order to be safe. Most of the supporting strength of the cover comes from the support of the water directly under it.

The slack addition calculation is designed, from experience, to give the cover and mechanism maximum life, as well as making the cover look as attractive as possible. Each cover will have some folds and wrinkles visible when it is closed.

Does the system require maintenance?

Yes. Basically keep it clean and running smoothly. Wash the cover every 6 months with a non-detergent soap. Clean all rotating surfaces by spraying with water every 6 months, this keeps



them free of dirt and debris which may cause clogging.

Clean the guides every 6 months also. With the cover open, spray water under pressure directly into the slot through which the cover travels, also spray into the pulley housings at the ends of the guides at close range to dislodge any debris which may have accumulated. Any dirt and grit which is

allowed to build up in the guides will cause abrasion and premature failure of the ropes and webbing, this is not covered under warranty. After washing the pulleys clean, spray with a Teflon based spray to keep them lubricated. Finally, if you have a cover installed in a pit, make sure the drainage points are kept clear so the cover and mechanism do not stand in water for long periods.



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