

ABOVE GROUND POOL

INSTALLATION MANUAL

MODEL CODE: PCOV-RD-SSSTSFDO



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You made the right choice

Built for stability & longevity

This is not a shortcut-built pool. It is a structurally engineered steel-wall system designed to stay level, stay round, and perform season after season. Every step in this manual exists to protect your investment.

Backed by *AquaDoc*, a brand trusted by over 1 million pool and spa owners.

1 Year Warranty



Full warranty against manufacturer defects. After year one, receive a 25% discount on replacement pools for the life of the product. Original owner of the pool only.

Why This Pool Is Different



Rigid Steel Wall Construction

Maintains its shape under full water pressure.



Engineered for Long-Term Use

Steel walls resist stretching, sagging, and fatigue.



Supports Full Pool Equipment

Built to handle skimmers, filters, and ladders.



Structurally Grounded Design

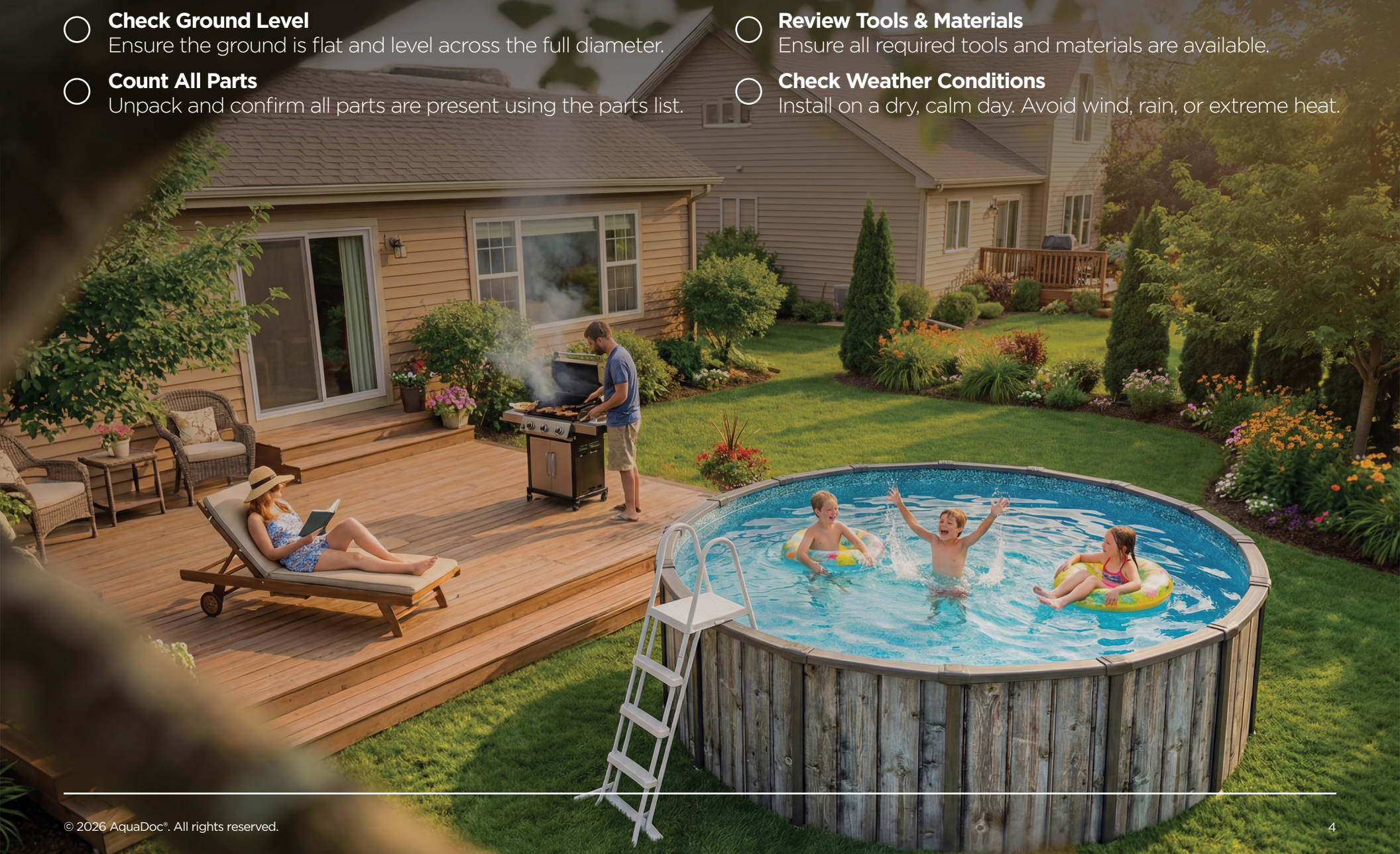
Reinforced uprights and rails distribute weight evenly.

Warning

Most installation issues result from skipping early steps. Follow the sequence, measure carefully, and do not rush. Improper installation, including partial burial or backfilling against the wall, voids the warranty.

Before You Start

- **Check Ground Level**
Ensure the ground is flat and level across the full diameter.
- **Count All Parts**
Unpack and confirm all parts are present using the parts list.
- **Review Tools & Materials**
Ensure all required tools and materials are available.
- **Check Weather Conditions**
Install on a dry, calm day. Avoid wind, rain, or extreme heat.



Above Ground Pool Safety - Please Read Before Installation

WARNING

Carefully read and follow all safety guidelines to address common risks of water recreation. Retain this information for future use.

Safety Recommendations



1. Never Jump or Dive

Above ground pools are not deep enough, and can cause serious injury or death.



2. Never Swim Alone

Someone must always be available to assist in an emergency.



3. Don't Leave Children Unattended

There is no substitute for constant adult supervision.



4. No Rough Play

Slippery surfaces can cause serious falls and injuries.



5. Restrict Access

Remove ladders when unattended and use a lockable fence.



6. Secure The Area

Use automatic locking doors on decks and remove toys to avoid attracting children.



7. Top Ledge Safety

Do not walk or sit on top ledges; they are slippery.



8. Sobriety

Do not use the pool under the influence of alcohol, drugs, or medication.



9. Sanitation

Use chemicals as directed to destroy bacteria and prevent algae.



10. Pool Covers

Never allow anyone on the cover; remove it completely before entry.



11. Electrical

Never touch electrical equipment when wet; bond the pool per NEC section 680-26.



12. Parts

Never modify the pool or drill holes unless instructed; use original manufactured parts.

Parts Listing

Ensure all parts are present before beginning installation.

	Pool Size	15'	18'	21'	24'	27'
G	Ledge Cover - Upper	10	12	14	16	18
A	Top Ledge	10	12	14	16	18
F	Top Plate	10	12	14	16	18
J	Wall Joiner Bars	2	2	2	2	2
D	Slotted Tube	10	12	14	16	18
D	Slotted Tube - Connector	10	12	14	16	18
I	Wall	1	1	1	1	1
G1	Ledge Cover - Lower	10	12	14	16	18
B	Upright	10	12	14	16	18
E	Bottom Plate	10	12	14	16	18
C	Bottom Rail	10	12	14	16	18
	Round Coping	13	15	17	20	22
	Installation / Warranty Bag	1	1	1	1	1
	Hardware Bag	1	2	2	2	2
	Quantities Per Hardware Bag					
AA	Screw - #12 x 5/8"	95	118	136	154	172
	Hardware Bag for Wall	1	1	1	1	1
	Quantities Per Hardware Bag					
	Bolt - Truss Head, Phillips 18-8	31	31	31	31	31
	Flange Nut - 1/4 - 20	31	31	31	31	31

(G) Ledge Cover - (Upper)

(AA) Screw - #12 x 5/8"

(A) Top Ledge

(F) Top Plate

(J) Wall Joiner Bars

(D) Slotted Tube

(I) Wall

(G1) Ledge Cover (Lower)

(B) Upright

(E) Bottom Plate

(C) Bottom Rail

Site Selection & Environmental Hazards

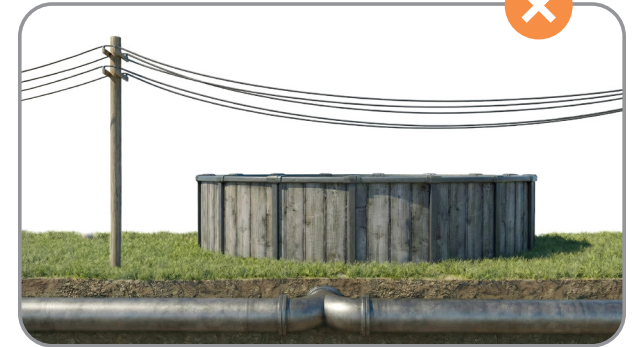
Choose a large, flat, well-drained area on dry, firm earth. Avoid Asphalt, gravel, peat moss, or wood surfaces. Avoid areas treated with oil-based weed killers or fertilizers.



Account for future decks near the pool.



Do not locate near overhanging branches



Do not locate near overhead wires, clotheslines, or buried pipes.

Critical Leveling Requirement

The entire pool foundation must be level within 1/4 inch across the full diameter. Greater variance can cause structural damage and void the warranty.

What happens if not level?

- Uneven wall pressure
- Upright distortion
- Liner stretching
- Pool shifting during fill

Warning

If the pool settles more than 1/2 inch during filling, immediately drain and correct the foundation.



Dig away high spots; never fill in low spots

Tools & Materials

Tools Required

- Compactor
- Level
- Rake
- Shovel
- Screwdriver
- Wrench
- Tape measure
- Gloves

Materials Required

- Straight wood plank
- Fine sand (debris-free)
- Concrete blocks (optional)
- Plastic sheeting



Safety Warning

Wear gloves when handling wall edges and skimmer holes.

Section 1

PREPARING THE FOUNDATION

Marking & Clearing

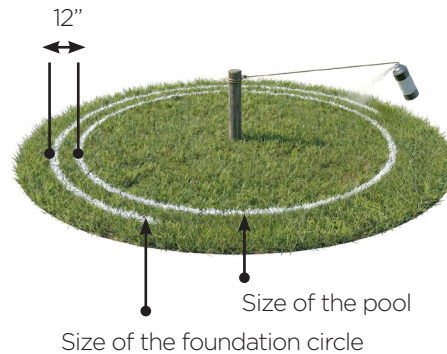
1. The Circle

Drive a center peg to mark the pool's center point.



2. Marking

Mark a circle 12 in (30 cm) larger than the pool diameter.



3. Sod

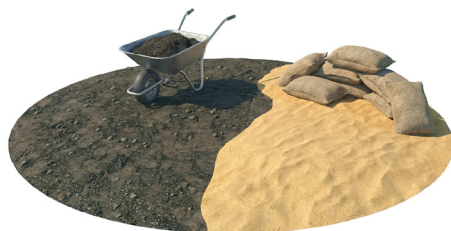
Remove all sod & plants from the marked area. Compact the ground thoroughly.



Precision Leveling

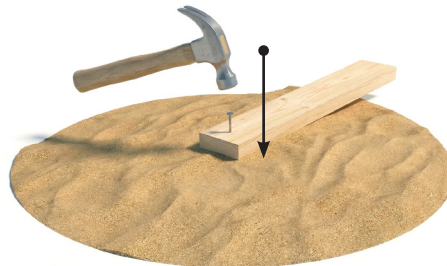
4. Base Sand Layer

Add a 2-3 in layer of fine, debris-free sand across the entire pool base.



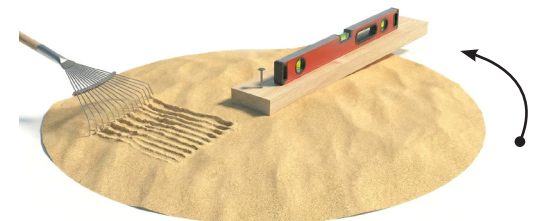
5. Method

Nail a straight 2x4 wood plank to a flush center stake.



6. Level

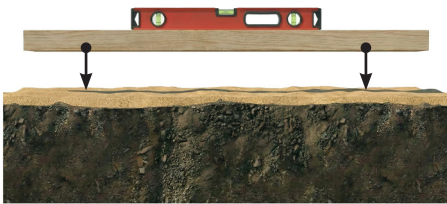
Rotate the plank with a carpenter's level. Remove high spots using a shovel or rake.



Perimeter Preparation

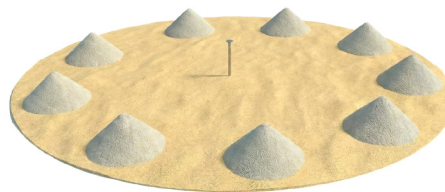
7. Diameter Level

Ensure the pool area is level across the entire diameter.



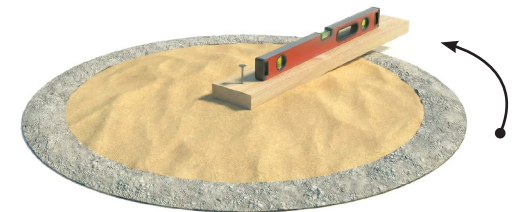
8. Base Material

Spread rock dust or fine mortar around the rim (24 in wide, 2 in thick).



9. Flat Zone

The outer 24 in (60 cm) must be perfectly flat for the wall to rest.



Final Foundation Check

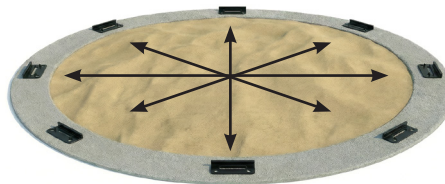
10. Bottom Plates

Evenly space the bottom plates around the perimeter.



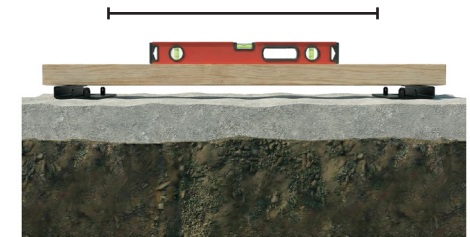
11. Roundness Check

Measure the diameter in several locations to confirm a true circle.



12. Optical Level

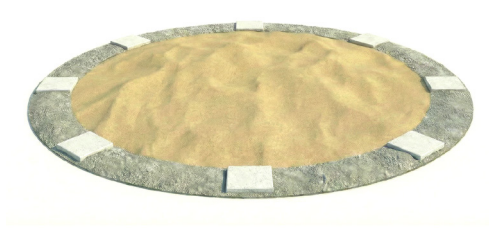
Verify the height of each bottom plate; all plates must be at the same height.



Patio Stone Installation (Optional)

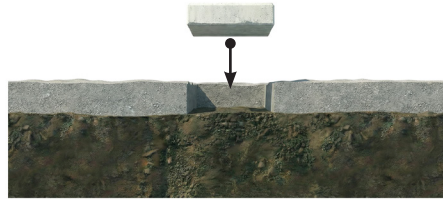
13. Place Stones

Replace each bottom plate with a patio stone.



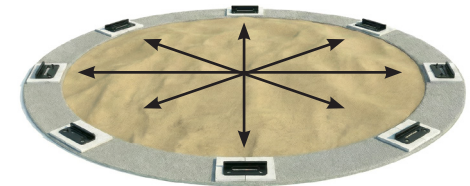
14. Stone Level

Sink stones flush with the soil and ensure they are level with each other.



15. Plates Return

Place bottom plates back on the stones and recheck diameters.



Assembling the Pool Base

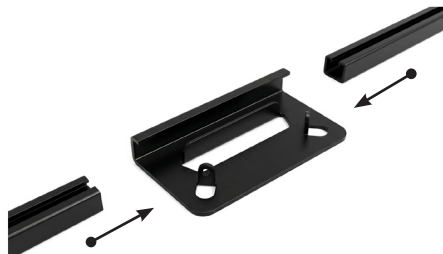
16. Plates Positioning

Confirm plates are fully seated and aligned correctly.



17. Rails Placement

Insert each bottom rail into its corresponding bottom plate.



18. Rail Gap

Refer to the following product chart for the required gap.



Round Pool Footprint Chart

Data Included

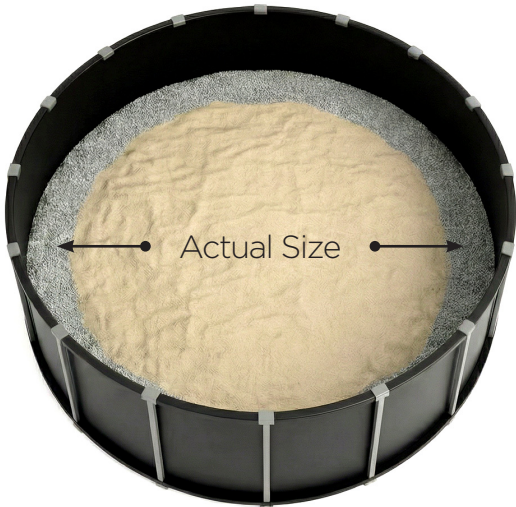
Number of uprights, rail radius, gap between rails, wall perimeter, and wall length.

Reference

Consult this chart for the mandatory gap measurement between bottom rails.

Metric System

All Dimensions are in inches unless otherwise specified.



Upright



Gap between bottom wall channels

Pool Size	15'	18'	21'	24'	27'
Uprights	10	12	14	16	18
Rails & Stabilizer	20	24	28	32	36
Radius of Rails	7.5'	9'	10.5'	12'	13.5
Gap between Rails	5/8	3/4	7/8	1/2	7/8
Wall Perimeter	565	679	792	905	1018
Wall Length	566	680	793	906	1019
Bottom Tracks Length	55 - 7/8"	55 - 7/8"	55 - 3/4"	56 - 1/8"	55 - 11/16"

Section 2

ASSEMBLING THE POOL FRAME

Setting Up the Pool Wall

1. Uncoiling

Center the wall end on a bottom plate, then guide the wall into the bottom rails.



2. Temporary Support

Use rope and ground stakes to hold the wall upright during setup.



3. Skimmer Orientation

Note that the skimmer and return openings are placed at the last section.



Wall Alignment Scenarios

Scenario 1

Wall fits correctly with even spacing around the circle.



Scenario 2

Wall appears short. Tap bottom plates inward to reduce rail gaps.



Scenario 3

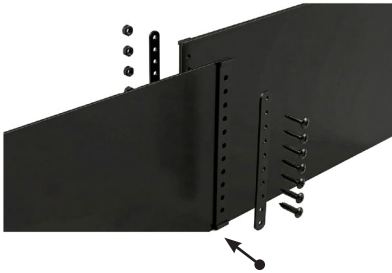
Wall appears long. Tap bottom plates outward to increase rail gaps.



Joining the Wall Seam

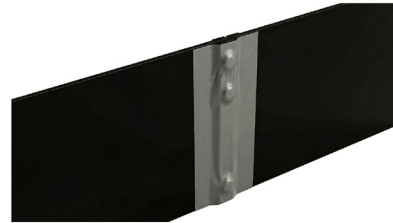
4. Fastening

Overlap the steel wall ends and secure with bolts inside and nuts outside.



5. Taping

Cover the interior seam and bolt heads with 2" duct tape to protect the liner.



6. Top Rails

Place top rails along the wall and connect them evenly to hold the circle.



Installing Uprights & Top Plates

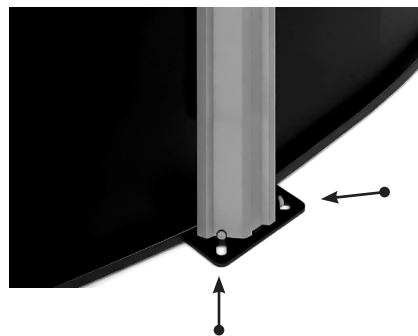
7. Uprights

Align uprights with base plate tabs; tabs must sit inside columns.



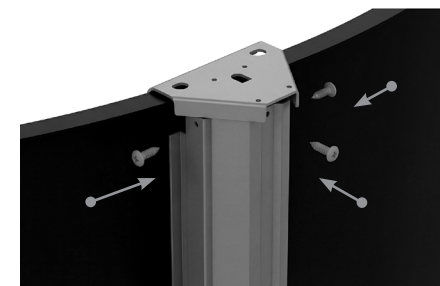
8. Screws

Secure uprights to bottom plates using the provided screws.



9. Top Plates

Position top plates over the wall and fasten to uprights.



Section 3

INSTALLING THE COVE & LINER

Putting the Cove

1. Foam Cove

If using foam cove pieces, insert them into the bottom rail.



2. Sand Cove

If using sand, form a cove against the wall (3-6 in high, 8-12 in wide).



3. Protection

If using sand cove, place plastic sheeting under the cove to protect the wall.



Liner Preparation

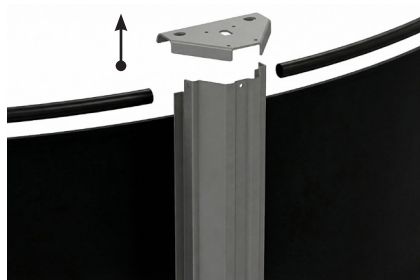
4. Warm the Liner

Unfold the liner in the center of the pool. Let it warm above 70°F.



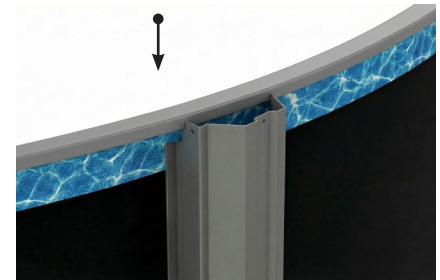
5. Remove Top Rails

Remove top rails & plates from the wall one by one to secure the liner in place.



6. Position the Liner

Drape the liner evenly over the wall. And secure with coping.



Liner Alignment

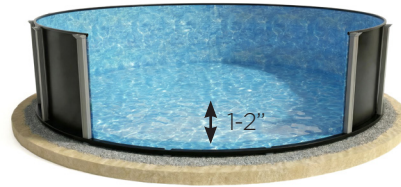
7. Floor Alignment

Smooth the liner across the base. Ensure the seams rest fully on the cove.



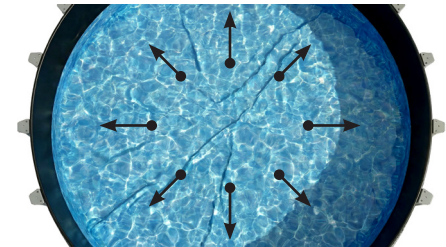
8. Initial Fill

Add 1-2 inches of water. Re-check level and roundness.



9. Remove Wrinkles

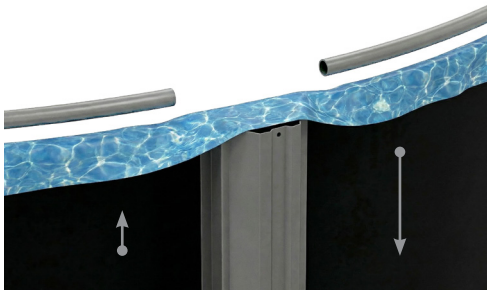
With shallow water, push wrinkles from center outward.



Securing & Filling

10. Adjust Height

Confirm liner hangs evenly. Adjust before reinstalling rails.



11. Reinstall Top Rails

Reattach top plates and rails over coping. Tighten evenly.



12. Final Fill

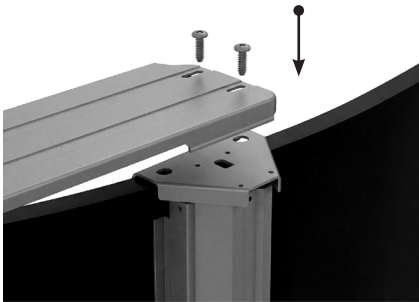
Continue filling slowly. Stop if wall shifts or liner pulls.



Installing Top Ledges

4. Mounting

Place top ledges between plates; leave screws loose until all are installed.



5. Perfect Circle

Push the pool wall inward at each upright to form a true circle.



6. Front Screw

Loosen the front screw connecting the top plate to the upright.



Installing the Ledge Covers

7. Bottom Ledge Cover

Slide bottom cover upward until it rests beneath the retaining screw.



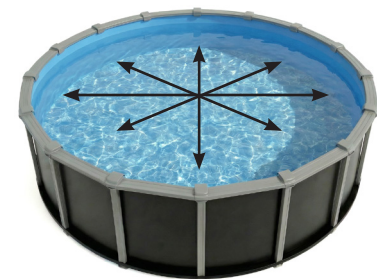
8. Top Ledge Cover

Snap top cover so the front lip overlaps the bottom cover.



9. Final Frame Check

Confirm the frame is round, level, and fully seated in all rails and plates.



Section 4

FILLING AND MAINTENANCE

Do Not Fill Until:

- **1. Bottom Plates**
Verify all bottom plates are level and evenly supported.
- **2. Diameter Check**
Confirm the pool diameter at three or more points.
- **3. Wall Seam**
Ensure all seam bolts are fully tightened and secure.
- **4. Seam Tape**
Cover the interior wall seam completely with duct tape.
- **5. Cove Installed**
Confirm the sand or foam cove is properly installed.
- **6. Frame Roundness**
Make sure the pool frame is evenly round before filling.

Installing the Plumbing

Diagram

Shows the connection between Skimmer, Pump, Filter, and Return Inlet.

Note

Separate installation manuals for the ladder, skimmer, pump, and filter are included with the kit components.



Maintaining Your Pool After Installation

Simple water care protects your pool, liner, and equipment by keeping water balanced, clear, and safe all season. Use compatible products that work together for consistent, balanced water.

Backed by *AquaDoc*, a brand trusted by over 1 million pool and spa owners.

The Essentials of Water Care

1. Test Weekly

Test Chlorine, pH, and Alkalinity

3. Balance pH & Alkalinity

Balanced water prevents corrosion

5. Clarify Cloudy Water

Use a clarifier if water appears dull.

2. Sanitize Consistently

Maintain proper Chlorine/Bromine levels

4. Shock When Needed

Shock after heavy use, or rain.

6. Prevent Algae Growth

Add algaecide regularly to stop buildup.



Need Support?

Find water care products, pool accessories, covers, replacement parts, and expert help at MAVAquaDoc.com or by scanning the QR code.



Note

Water care products shown are sold separately. Not included with this kit.



(877) 278-2006



MavAquaDoc.com



3750 Gunn Highway, Suite 306-C1043 Tampa, FL 33618