

Installation Instructions for



Genesis Series Water Fountains

Congratulations, you have just purchased the finest watering fountain on the market. This unit is built to give you excellent service when properly installed and maintained. Please follow instructions carefully. Read and understand all instructions before installing

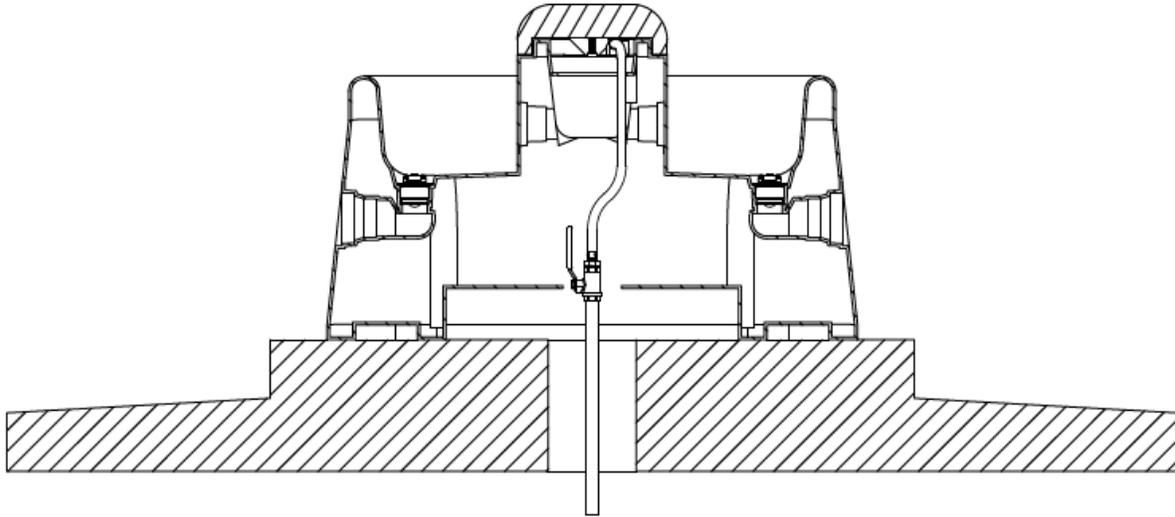
Ritchie Industries, Inc.
800-747-0222

    @RitchieWaterers

Part # 24238
January 1, 2020

Models G1, G2 and GC-2

Installation Instructions



- A. **Location** - Putting the fountain in a location that offers protection from the wind will enhance the performance of the unit. Livestock will tend to gather in a protected area, enticing them to drink more.
- B. **Water Supply Line** –
1. **Option A** - The horizontal underground water line should be sized to account for pressure drop, relating to distance, at least 3/4" in diameter. A 3/4" vertical supply pipe is recommended. A shut-off valve should be installed under the fountain for servicing. Flush water supply line before connecting to fountain. Water supplies with material such as sand, rust, etc. may require a filter to keep valve working properly. Connect supply hose to customer supplied shutoff valve at the top of the concrete prior to anchoring unit.
 2. **Option B** – Garden hose hook up is available by purchasing Ritchie Part #18799 (G1 and G2 with 3/8" hose) or Ritchie Part #18696 (GC-2 with 5/8" hose). Follow instructions included in the package. Be sure to place hose out of the reach of animals.
- C. **Mounting Platform** – A concrete platform should be provided for all fountains. It should be at least 4" thick and large enough to accommodate fountain. An additional 4" high step 18" out from each side of the unit will protect the unit from manure handling equipment, as well as discouraging animals from defecating in the fountain. Extending the platform provides animals a place to stand while drinking, consider the size of your animals when determining the dimensions of your platform. Slope the platform away from the fountain for drainage. A rough broom finish on the concrete surface provides better footing for animals.
- D. **Hold-Downs** - The Genesis fountains are provided with four built-in hold-downs to anchor your unit securely to the platform. The use of 3/8" x 5" stainless steel expansion anchor bolts (not included) is recommended for concrete installations. Anchor bolts are available from Ritchie in a two pack, part #16555. Fender washers are supplied for use with anchors.

E. **G1 and G2 - Assemble and Install valve** – Attach valve to base using the screws provided. A short Phillips screwdriver or angled ratchet driver facilitates easy installation. Attach the float arm to valve arm with toothed washer between plastic arms. Secure with wing nut.

GC-2 Assemble and Install Valve –

1. Insert valve rubber into the valve rubber retainer.
2. Attach float arm to float as shown in diagram. The raised emboss on top of float should be orientated as shown.
3. Screw thumb screw into cam arm. To adjust water level, tighten thumb screw to lower, loosen thumb screw to raise.
4. Insert the valve rubber retainer into the valve body with the valve rubber up. Align the cam arm to the valve body and insert first pin.
5. Align the float arm and attached float to the cam arm and insert second pin.
6. Attach assembled valve to base. Bracket rubber washer, plastic washer and nut should be installed on hose side of base mounting notch.

F. **Hose Connection** –Cut hose to proper length and slip onto the barb fitting of the valve assembly. Clamps are furnished to secure the connection.

G. **Drain Plug** – Install pre-assembled drain plug(s) from inside of trough. Tighten wing nut to secure and prevent accidental removal by animals.

NOTE: *To drain the unit, you can push the plug from outside of the unit in to the center of the unit, instead of reaching into the water to pull the plug out. After the fountain drains, then reach in to retrieve the plug and install it from the inside.*

H. **Float Adjustment** – Adjust float for a water depth 1-2 inches below top of trough using the wing nut or thumb screw.

I. **Install Valve Cover** – With the valve functioning properly and the water level set at the proper level, you may install the valve cover with captive screws in cover.

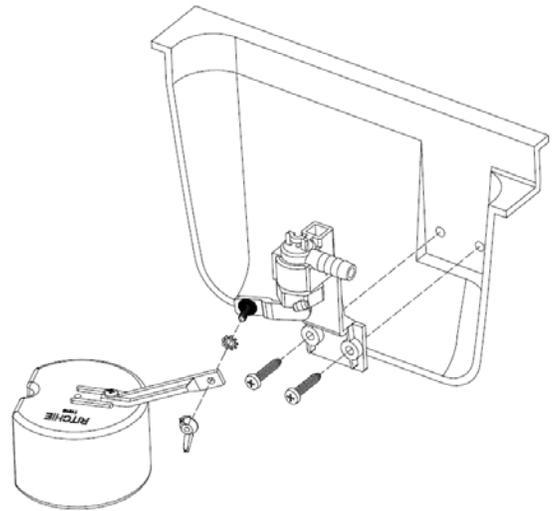


Figure 1 G1 & G2 Valve Detail

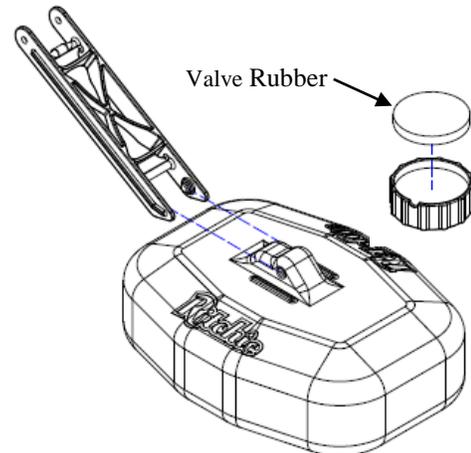


Figure 2 GC-2 Valve Detail 1

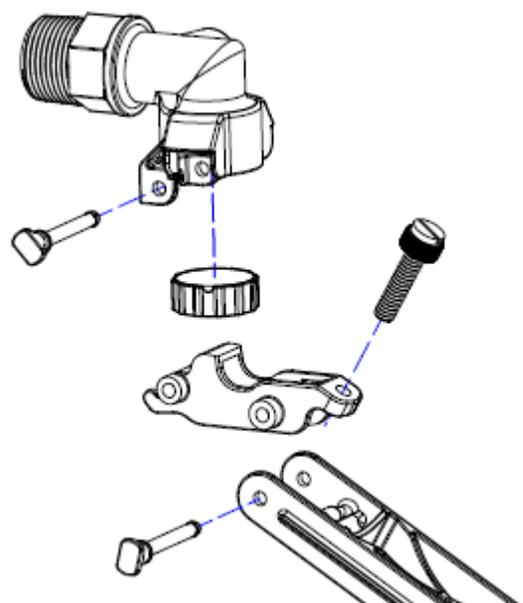


Figure 3 GC-2 Valve Detail 2

Valves

Ritchie valves come in multiple sizes and pressure ratings as shown below.

The GC-2 units use the Ritchie 3/4" valves. The GC-2 come standard with our 3/4" yellow high pressure valve that is rated up to 110 psi.

The G1 and G2 units use the Ritchie 1/2" valves. A red valve is standard with both units. This valve accommodates most common operating pressures, and provides more than adequate water flow rates for the number of animals that could be drinking at any one time from these troughs.

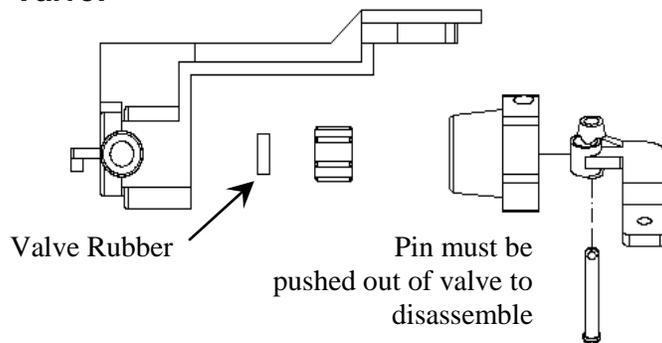
1/2"	Part #	GPM	Pressure Range
White	12574	4.8	Low, 5-40 psi
Red	12575	3.4	Moderate, 40-60 psi
Green	13597	1.45	High, 60-80 psi

If water pressure is very high and if the valve does not shut off, a pressure-reducing valve may be needed. Your individual situations may require a change from the standard valve supplied with your fountain, see your Ritchie Dealer if this is needed.

Trouble Shooting

Problem	Solution
Valve won't stop dripping	a) Check float adjustment. Ensure float moves freely.
	b) Disassemble valve and check for sand or scale in valve rubber
	c) Turn valve rubber over and re-assemble. See below.
	d) Check for excessive water system pressure.
Low Water Flow	a) Check that valve inlet is not plugged or supply hose is not kinked.
	b) Check system pressure from supply hose by installing a tee and pressure gauge in front of the valve to check pressure drop when valve is open. A severe pressure drop indicates a restriction or undersized supply system.
	c) Check that shut off valves are fully open.

1/2" Valve:



Ritchie Limited Warranty

Effective September 2018

Ritchie Industries, Inc. warrants its products to be free of defective materials and workmanship. Defective part(s) will be repaired or replaced at the option of Ritchie Industries. **This warranty specifically excludes all labor and shipping charges.**

This warranty does not apply to any appearance items, to any product whose exterior has been damaged or defaced, to any product that has been installed improperly, to any product subjected to misuse, abnormal service or handling, and to any products altered or repaired with other than original equipment or manufacturer's parts.

This warranty gives you specific legal rights, and you may also have other rights which vary from state to state.

All warranty claims must be processed through an Authorized Ritchie Dealer/ Distributor. **Proof of purchase is required. This warranty is not transferable.** The period of warranty begins at original date of purchase as follows:

Poly Units

Base, top and ball closures:

One year from the date of purchase against manufacturing defect, 100%.

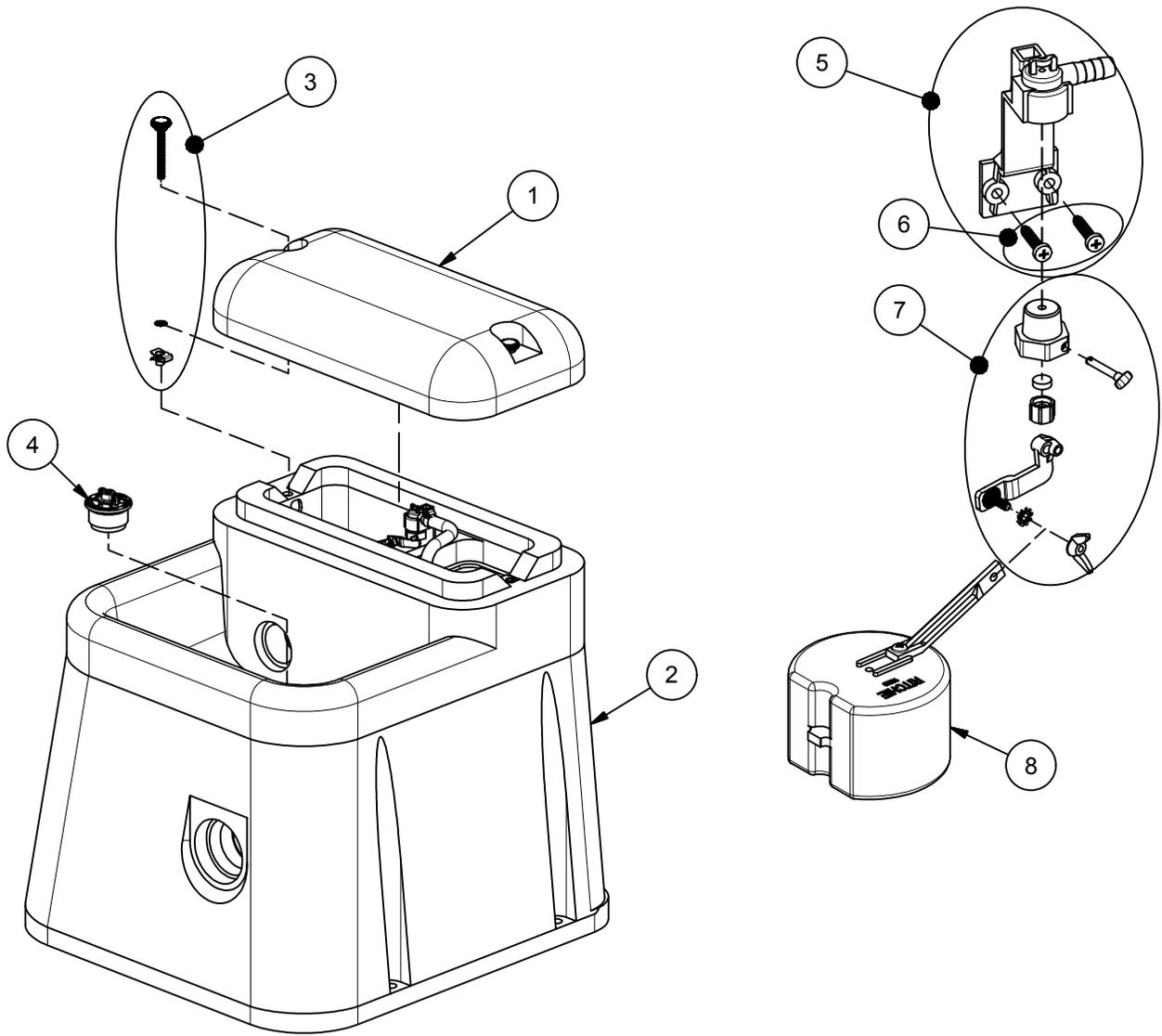
Component Parts

All component parts, such as floats and valves:

One year from the date of purchase against manufacturing defect, 100%.

Genesis 1 Fountain

Part # 18880



OPTIONAL
OUTSIDE TROUGH
DRAIN PLUG

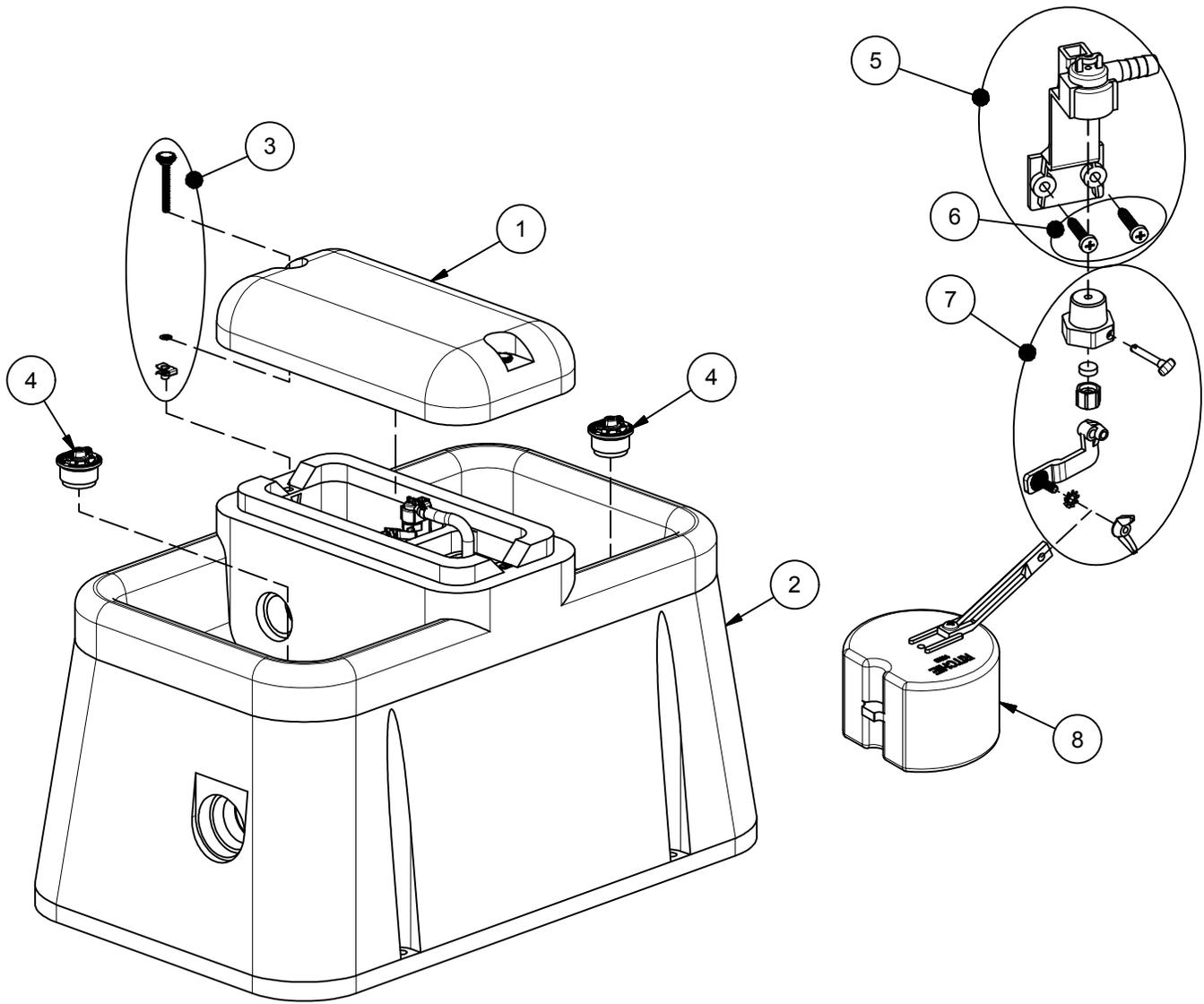


OPTIONAL
GARDEN HOSE
ADAPTER

Item	Part #	Description	Qty	Item	Part #	Description	Qty
1	18882	Genesis Cover	1	7	12575	Red Valve 1/2" pkg	1
2	18886	Genesis 1 Base	1	8	13613	Float with Short Arm pkg	1 pkg
3	18821	Cover Screws & Hardware	1 pkg				
4	18849	Ritchie 2" Plug pkg	1 pkg	NS	18883	G1 Accessory pkg	1 pkg
5	11515	Valve Bracket w/screw pkg	1 pkg	NS	18799	Garden Hose Hookup	1
6	18709	Screw Valve Mount (4/pkg)	1 pkg	NS	18470	Ritchie 3" Plug pkg	1 pkg

Genesis 2 Fountain

Part # 18885



OPTIONAL
OUTSIDE TROUGH
DRAIN PLUG

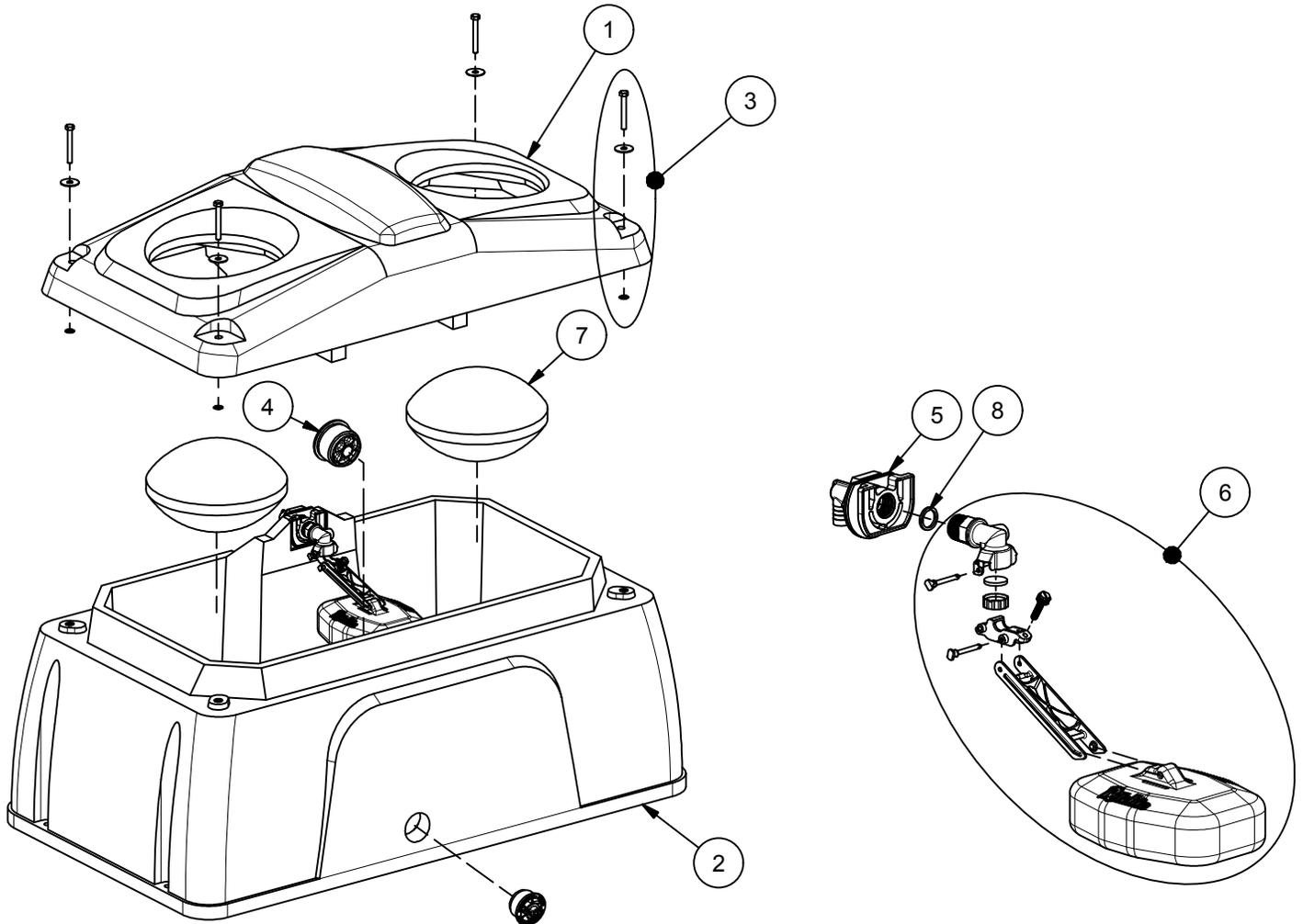


OPTIONAL
GARDEN HOSE
ADAPTER

Item	Part #	Description	Qty	Item	Part #	Description	Qty
1	18882	Genesis Cover	1	7	12575	Red Valve 1/2" pkg	1
2	18886	Genesis 2 Base	1	8	13613	Float with Short Arm pkg	1 pkg
3	18821	Cover Screws & Hardware	1 pkg				
4	18849	Ritchie 2" Plug pkg	2 pkgs	NS	18888	G2 Accessory pkg	1 pkg
5	11515	Valve Bracket w/ screw pkg	1 pkg	NS	18799	Garden Hose Hookup	1
6	18709	Screw Valve Mount (4/pkg)	1 pkg	NS	18470	Ritchie 3" Plug pkg	2 pkgs

Genesis GC-2 Fountain

Part # 18890



OPTIONAL
OUTSIDE TROUGH
DRAIN PLUG



OPTIONAL
GARDEN HOSE
ADAPTER

Item	Part #	Description	Qty	Item	Part #	Description	Qty
1	18892	Genesis GC-2 Cover	1	7	18674	Elliptical Ball Enclosure (Blue)	2
2	18891	Genesis GC-2 Base	1	8	18475	O-Ring Valve Seal Pkg (4/pkg)	1
3	18858	Cover Screws & Hardware GC-2	1 pkg	NS	18893	GC-2 Accessory pkg	1 pkg
4	18470	Ritchie 3" Plug pkg	1 pkg	NS	18696	Garden Hose Hookup	1
5	18838	HP Valve Brkt Assy pkg	1 pkg	NS	18849	Ritchie 2" Plug pkg (Optional)	1 pkg
6	18832	HP Valve Assembly pkg	1 pkg				