




 **WARNING:** Any electrical service must be installed and maintained by a qualified electrician. Must conform to all national and local codes. Use a properly sized wire for the distance and current draw for your specific unit. Circuit protection may be required and should be sized according to the unit ratings.


 **WARNING:** National/Local electrical codes may require livestock waterers with electric heat, installed in feedlots in open feeding area to be earthed by a separate stranded copper earthing conductor or at least no.6 AWG terminating at a point where the branch circuit receives its supply. Check with local authorities.


 **WARNING:** This installation must be made and maintained in strict conformity with National/ Local plumbing codes and National/Local electrical codes (CSA in Canada). The applicable provisions of these codes take precedent. Failure to make and maintain all installations properly may result in loss of livestock, personal injury, or death.


 **CAUTION:** This appliance can be used by children aged from 8 years and above and persons with reduced physical, sensory or mental capabilities or lack of experience and knowledge **if** they have been given supervision or instruction concerning use of the appliance in a safe way and understand the hazards involved. Children being supervised not to play with the appliance. Cleaning and user maintenance shall not be made by children without supervision.

 **CAUTION:** Disconnect power if the water supply is to be shut off for an extended amount of time. Failure to turn off power can result in damage to the watering fountain.

 **CAUTION:** For cord connected units, connection must be made only to a properly earthed circuit protected by a Residual Current Device (RCD).

 **CAUTION:** Assure that there is water in the trough before turning on power to the heating system and immersion heater as applicable. Running this unit or immersion heater without water in the trough could cause damage to some components.

 **CAUTION:** When using the immersion heater for supplemental heat, assure that heater will be completely below the water surface.

 **CAUTION:** Maximum water supply pressure should not exceed hose rating of 200 psi (13.8 Bar). Use of a pressure reducer may be required for extreme pressures.

 **CAUTION:** Access panel can only be removed by service personnel or similarly qualified person.

NOTE: *A means for disconnection must be incorporated in the fixed wiring in accordance with the wiring rules.*

Fountain Installation Instructions

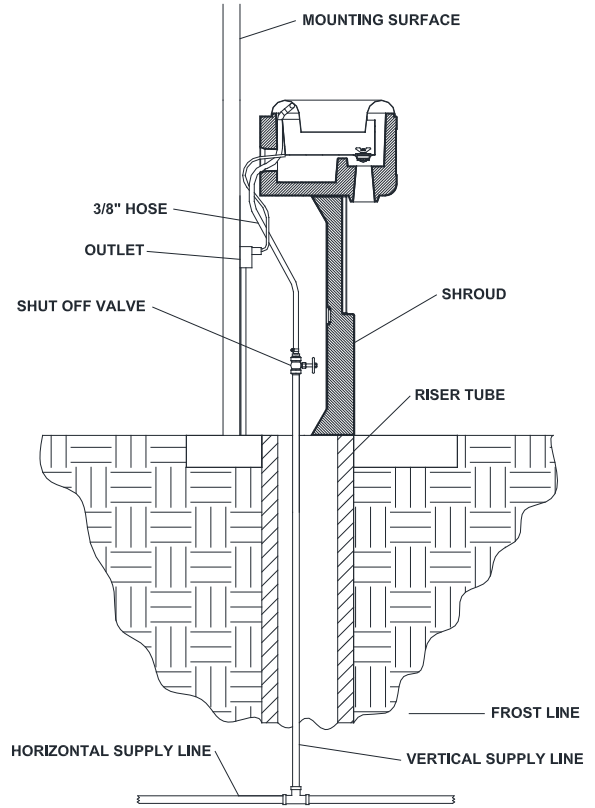
A. Installation of Stall Fount - The Stall Fount - Unheated and the Stall Fount - Heated are to be corner mounted and are designed to accept the water supply line from below, from above or from behind the fountain through the wall.

Item No.	Description	Watts	Amps
18740	Equine SF 120V	173W	1.4A@120V

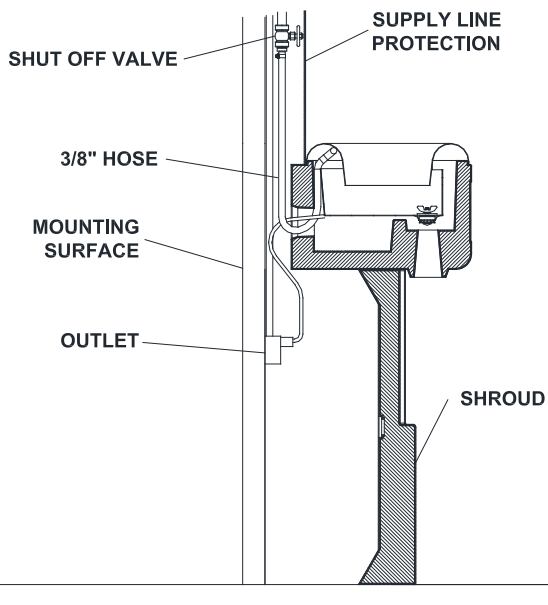
Item No.	Description	Watts	Amps
18741	Equine SF 240V	228W	1.00A@240V

B. Water Supply Line from Underground – Horizontal underground water line should be sized to account for pressure drop, relating to distance, and placed one foot below the frost line. A one-inch vertical supply pipe is recommended, placed inside of a riser tile. A shut-off valve (as pictured) should be installed under the fountain to allow for servicing. If your facility is cold in the winter, using a Ritchie Thermal Tube in combination with the insulated shroud will provide optimum protection to the vertical supply line against frost and freezing.

C. Water Supply from Overhead - Overhead water lines should be sized to account for pressure drop, relating to distance, and placed out of reach of livestock. A one-inch vertical supply pipe is recommended, placed inside of a protective cover. A shut-off valve (as pictured) should be used at the fountain to allow for servicing. If your facility is cold in the winter, additional cold climate protection should be incorporated to protect the vertical supply line against frost and freezing.



D. Water Supply Through Wall - Through wall supply lines should be sized to account for pressure drop, relating to distance, and located to prevent tampering by livestock. A one-inch supply pipe is recommended. A shut-off valve should be located at the fountain to allow for servicing. If your facility is cold in the winter, additional cold climate protection will be required.



E. Water Hose - The Stall Fount comes with a 3/8" rubber hose (30 in. [762 mm] long) which attaches to the supply pipe with a 3/8" hose barb and hose clamp. When using a riser tube the vertical supply line it must be centered in tube below ground to provide an air space between the line and frozen ground outside of tube. Do not surround supply line with insulation, wood or any foreign material. Any foreign material in the tube may cause frost to migrate to supply line causing supply line freezing.

Flush water supply line thoroughly before connection to fountain. Water supplies with foreign material such as sand, rust, etc. may require a filter to keep fountain valve working properly.

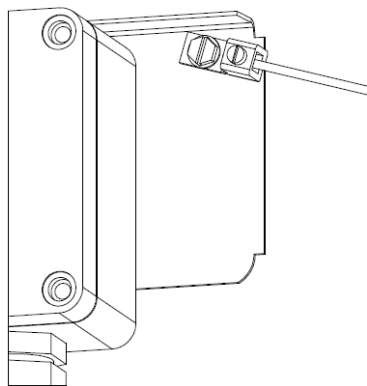
F. Mounting the Fountain - The stainless-steel cover and trough must be removed prior to mounting. The cover can be removed by removing the two screws on the cover. The trough can then be removed by removing the two hex head screws.

CAUTION: For maximum protection, it is recommended to use the Ritchie Shroud for supply line protection under the unit.

Mount the unit on the wall at a height appropriate for your animals. If you are using the optional plastic shroud, then use the shroud as a guide for determining the height of the unit. Use of 3/8" carriage bolts or lag screws (not provided), and washers, is recommended. Do not over tighten the screws as damage could occur to the plastic.

After the Stall Fount is securely mounted to the wall and all supply connections are made you can reinstall the trough with the hex-head screws. Do not over tighten the screws as that could result in damage to the plastic base. Insert the drain plug firmly into the drain hole near the front of the trough.

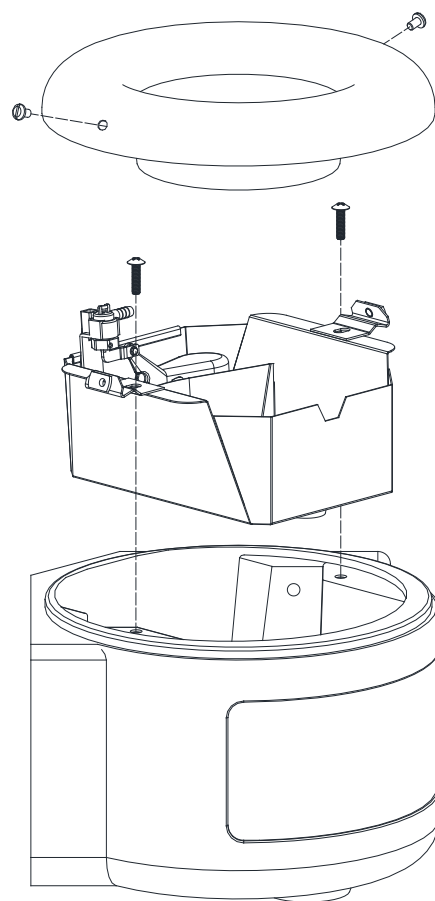
G. Electrical Connections – Power supply wires should be run into the junction box provided with the units. Use of the strain relief provided will provide sealing and strain relief for incoming wires. This prevents moisture from entering the wire connections. If the incoming wire/cable size is not sized for the provided cord grip, a different adapter may be required.



FOR CE INSTALLATIONS ONLY – Power supply wires must be run in a conduit that is attached to the supplied junction box. Additional fittings will be required.

H. Ground Connection – Attach local ground rod with bare copper wire to the ground lug provided near the junction box. Localized grounding will minimize the risk of stray voltage and may be required by your local electrical code.

1. Loosen screw on lug
2. Place bare ground wire from ground rod under screw.
3. Firmly tighten screw to secure wire.



G. Cable Heater – Uncoil cable heater attach to the water supply with the cable twist ties provided. This heater is water-tight but should not be immersed in water. Heater may cross over itself but should not be tightened at those locations. It is not recommended to route cable heater around the valve in this unit.

CAUTION: Installation must not cause any strain on heater wiring connections. Avoid heater damage caused by hot spots due to its leads lying too close to each other. Also, do not wrap additional insulation around heater.

NOTE: Condensation drain hole in the base is not to be used for heat cable or electrical wire routing.

H. Adjust Water Level – After the drain plug is installed, turn on water and adjust float to water level mark or until there is approximately 3 in. [76 mm] of water in trough. Float is adjusted by loosening the wing-nut then raising or lowering the float as needed, and then re-tightening the wing-nut. When finished adjusting, reinstall the stainless-steel cover with the two screws.

I. Installing the Shroud (Optional) – After the plumbing and electrical connections are made, install the shroud under the unit using 3/8" lag screws or bolts. For irregular mounting surfaces, foam tape (included) may be applied to the mounting surfaces to eliminate air gaps. Two-inch [51 mm] rigid insulation can be mounted against the stall walls, behind the shroud for maximum supply line protection in severe climates.

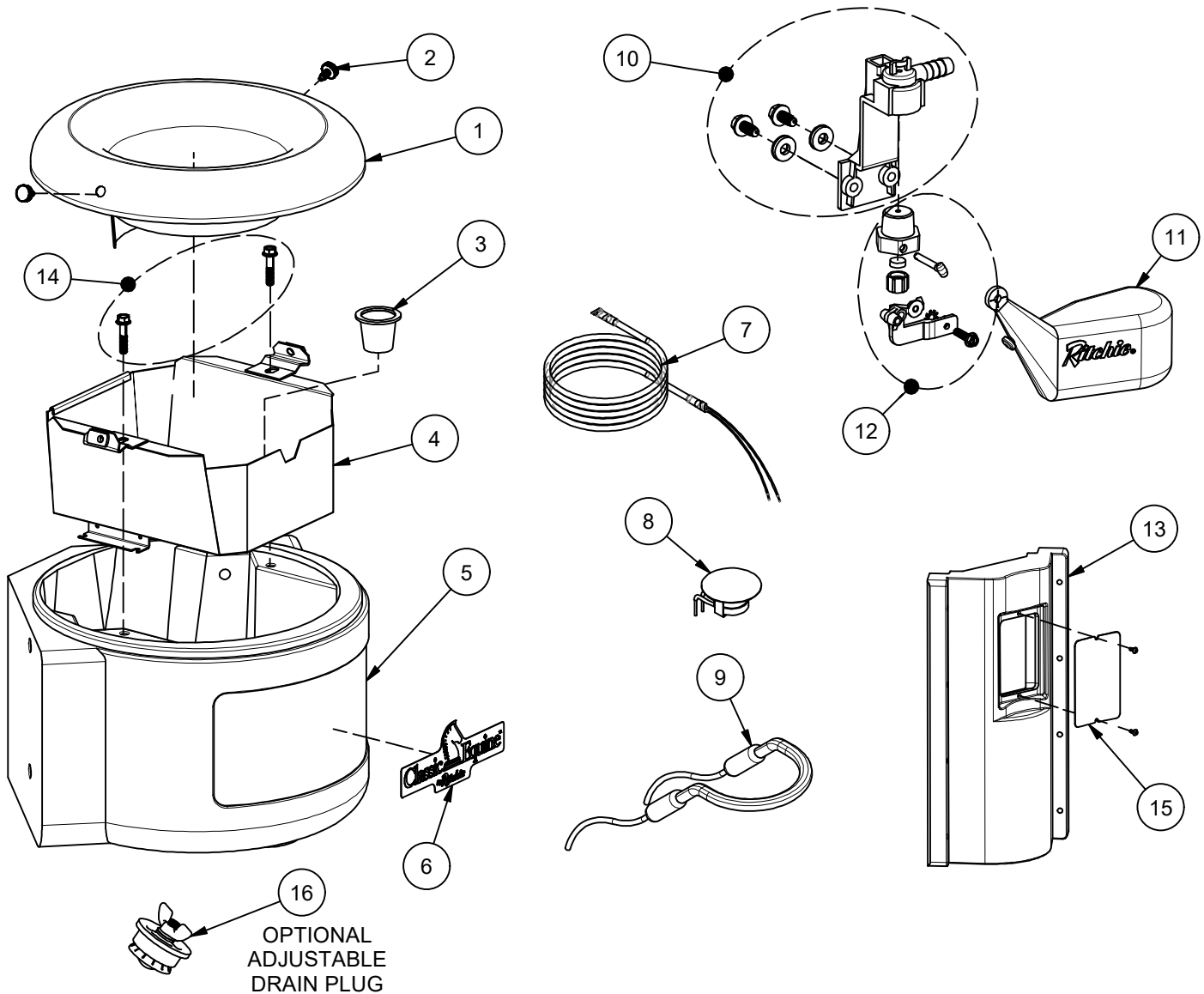
J. Maintenance – Regular maintenance is required for optimal performance. The valve rubber in your valve can be removed and either flipped for a new seal surface or replaced to prevent dripping. Higher pressure will require more frequent replacements. Remove any mineral build up on the valve components to allow for free movement of the valve. Heaters, cable heaters and thermostats should be checked for functionality prior to cold weather. Remove any debris accumulation in the riser tube. Sealant around the base should be checked for cracking and replaced as needed to prevent air permeation.

Troubleshooting

Problem	Solution
Ice in Trough	Check fuses or circuit breakers
	Check heating elements to make sure they are working and hot
	Check voltage after the thermostat to the fountain with and without electrical load.
Supply line freezing	Check that the cable heater is fastened to supply line and is working (hot).
	Check that supply piping is centered in riser tube and that there is air space between riser tube and supply line. Ritchie Thermal Tubes are recommended as they have optimum inside and outside diameter to maximize insulation.
	Check that riser tube is free of water and mud that may freeze.
Valve won't shut off	Check float adjustment. Check for waterlogged float and free range of motion.
	Disassemble valve and check for sand or scale in valve rubber. Also check valve orifice outlets for wear and damage. A screen or filter may be required with sandy or scaly water
	Turn valve rubber over and re-assemble
	Check for excessive water system pressure (greater than 60 psi [414 Kpa]). May need to use pressure reducer.
Low water flow	Check that valve inlet is not plugged or supply hose is not kinked
	Check system pressure to unit. A severe pressure drop indicates a restriction or undersized supply system.
	Check that shutoff valves are fully open.

Classic Equine STALLFOUNT

Part # 18740



Item	Part #	Description	Qty	Item	Part #	Description	Qty
1	18486	Cover	1	13	18746	Shroud 30"	1
2	18494	Screw PKG - SF Cover (2/pkg)	1 pkg	14	18878	Trough HD Screws (2/pkg)	1 pkg
3	18628	Drain Plug (2/pkg)	1 pkg	15	18695	Acc. Panel w/ screws (Equine SF)	1 pkg
4	18477	Trough (120V/240V)	1	16	18643	Drain Plug 1 1/2" Adj	1
5	18742	CE Stallfount Base	1	NS	18744	Shroud 20"	1
6	18719	Classic Equine Logo pkg (2/pkg)	1 pkg	NS	18613	Adapter 1/2" x 3/8 HB	1 pkg
7	13830	Cable Heater 120V 48 Watt	1 pkg	NS	15931	Hose Clamp (5/pkg)	1 pkg
8	11885	Disc Thermostat Pkg.	1 pkg	NS	18754	Equine SF Accessory Pkg.	1 pkg
9	14150	Heater 120V 125 Watt	1 pkg				
10	18641	Valve Bracket & Screws SF2	1 pkg		18748	CE Stallfount - No Heat	
11	18642	Float	1 pkg	NS	18487	Trough (No-Heat)	1
12	13597	Valve Pkg. Green	1 pkg				



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RITCHIE INDUSTRIES, INC.

LIMITED WARRANTY

Ritchie Industries, Inc., hereinafter referred to as Ritchie Industries, gives a LIMITED WARRANTY for the period of time(s) stated herein, subject to certain limitations, on your new watering system against defects in material or workmanship when properly installed, set up, operated, and maintained in accordance with the instructions and recommendations set forth by Ritchie Industries, including in the Installation Instructions. **The warranty excludes labor and shipping charges.**

The warranty is transferable to the next purchaser of the watering system prior to expiration of the warranty period, but any such transfer will not extend the original warranty term. Proof of purchase must be submitted with any warranty claim, and all warranty claims shall be processed through an Authorized Ritchie Dealer or Distributor.

Ritchie Industries' liability for any defects in material or workmanship with respect to accepted goods shall be limited to repairing the goods or replacing them as Ritchie Industries shall elect. Parts used in warranty repairs will be warranted for the balance of the water system's warranty period, with all parts replaced under warranty becoming the property of Ritchie Industries.

The limited warranty periods begin upon delivery of the watering system to the original purchaser. Upon delivery of the goods, purchaser assumes all liability, including but not limited to all personal injury and property damage, resulting from the handling, possession, or use of the goods.

WARRANTY COVERAGE AND LIMITATIONS

Limitations of Warranties and Remedies

Ritchie Industries' watering systems are designed and manufactured to provide years of reliable use when installed and operated consistent with Ritchie Industries' instructions and recommendations. However, the potential for improper installation, modifications and misuse of the goods exists. Therefore, the limited warranty provided shall be as follows:

This limited warranty shall not apply to any appearance items and shall not apply to any product which has been subject to misuse, abuse, abnormal service or handling, negligence, or accident, nor to any product that is installed and/or used contrary to Ritchie Industries' installation instructions and instructions for use. The limited warranty shall also not apply to any product whose exterior has been damaged or otherwise defaced, that has been repaired, altered, or modified by anyone, other than Ritchie Industries, in a way so as in Ritchie Industries' judgment it adversely affects the product's operation, performance, durability, or intended use, nor to any product where removal of parts, modification(s) or use of parts or accessories not manufactured or approved by Ritchie Industries has caused damage.

Coverage and Warranty Periods

Unit Type	Coverage and Warranty Period
Poly Units	Base, top, and ball closures. Ten-year limited warranty: 100% for first five years, then declining 20% per year for remainder of the 10-year period.
Stainless Steel Units	Stainless trough and stainless valve chamber frame. Ten-year limited warranty, plus ten years of corrosion coverage, at 100% for entire 10-year period.
Component Parts	One-year limited warranty on all component parts, such as floats, valves, and heating elements.

Exclusions of Liability

EXCEPT AS OTHERWISE EXPRESSLY STATED HEREIN, RITCHIE INDUSTRIES MAKES NO OTHER WARRANTY OR REPRESENTATION OF ANY KIND, EXPRESSED OR IMPLIED. **THE IMPLIED WARRANTY OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE EXCLUDED FROM THIS LIMITED WARRANTY.** TO THE EXTENT THEY CANNOT BE DISCLAIMED, THE IMPLIED WARRANTIES ARE LIMITED IN DURATION TO THE LIFE OF THE EXPRESS WARRANTY. **THIS LIMITED WARRANTY EXCLUDES INCIDENTAL, CONSEQUENTIAL, AND SPECIAL DAMAGES. THIS EXCLUSION OF CONSEQUENTIAL, INCIDENTAL, AND SPECIAL DAMAGES IS INDEPENDENT FROM AND SHALL SURVIVE ANY FINDING THAT THE EXCLUSIVE REMEDY FAILED OF ITS ESSENTIAL PURPOSE.** THE REMEDIES SET FORTH IN THIS LIMITED WARRANTY ARE THE ONLY REMEDIES AVAILABLE TO ANY PERSON UNDER THIS WARRANTY. SOME STATES/PROVINCES DO NOT ALLOW FOR THE DISCLAIMERS, LIMITATIONS, AND EXCLUSIONS IDENTIFIED ABOVE AND, AS A RESULT, THEY MAY NOT APPLY TO YOU.

No agent, employee or representative of Ritchie Industries, and no Ritchie Industries Dealer/Distributor, is authorized to bind Ritchie Industries to any representation or warranty regarding the goods except as specifically included in this limited warranty.

Installation Instructions for



P L A Y T O W I N TM

STALLFount

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.



Alternate formats for this manual are available at:
www.Ritchiefount.com



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SF EQUINE BAG ASSEMBLY



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