

# **BINKS® GALVANIZED 30 AND 60 GALLON ASME TANKS**



## **DESCRIPTION**

Binks pressure feed tanks are intended for use as a pressure container to supply material at a constant preset pressure up to a maximum of 110 psi. The tanks are built to ASME specifications. Also certified for vacuum operation.

### **GALVANIZED 30-GALLON MODELS**

<b>Tank Model</b>	<b>Regulation</b>	<b>Agitation</b>	<b>Actual Capacity</b>
83-5801	Single (Regulated air to tank only)	None	35.7 US Gal
83-5807	Single (Regulated air to tank only)	Gear-reduced (Heavy-Duty)	35.7 US Gal

### **GALVANIZED 60-GALLON MODELS**

<b>Tank Model</b>	<b>Regulation</b>	<b>Agitation</b>	<b>Actual Capacity</b>
83-5701	Single (Regulated air to tank only)	None	65.7 US Gal
83-5707	Single (Regulated air to tank only)	Gear-reduced (Heavy-Duty)	65.7 US Gal

**Important: Read and follow all instructions and SAFETY PRECAUTIONS before using this equipment. Retain for future reference.**

In this part sheet, the words **WARNING**, **CAUTION** and **NOTE** are used to emphasize important safety information as follows:

## **WARNING**

Hazards or unsafe practices which could result in severe personal injury, death or substantial property damage.

## **CAUTION**

Hazards or unsafe practices which could result in minor personal injury, product or property damage.

## **NOTE**

Important installation, operation or maintenance information.

## **WARNING**

### Read the following warnings before using this equipment.



#### READ THE MANUAL

Before operating finishing equipment, read and understand all safety, operation and maintenance information provided in the operation manual.



#### OPERATOR TRAINING

All personnel must be trained before operating finishing equipment.



#### EQUIPMENT MISUSE HAZARD

Equipment misuse can cause the equipment to rupture, malfunction, or start unexpectedly and result in serious injury.



#### LOCK OUT / TAG-OUT

Failure to de-energize, disconnect, lock out and tag-out all power sources before performing equipment maintenance could cause serious injury or death.



#### AUTOMATIC EQUIPMENT

Automatic equipment may start suddenly without warning.



#### PRESSURE RELIEF PROCEDURE

Always follow the pressure relief procedure in the equipment instruction manual.



#### KEEP EQUIPMENT GUARDS IN PLACE

Do not operate the equipment if the safety devices have been removed.



#### KNOW WHERE AND HOW TO SHUT OFF THE EQUIPMENT IN CASE OF AN EMERGENCY



#### WEAR SAFETY GLASSES

Failure to wear safety glasses with side shields could result in serious eye injury or blindness.



#### INSPECT THE EQUIPMENT DAILY

Inspect the equipment for worn or broken parts on a daily basis. Do not operate the equipment if you are uncertain about its condition.



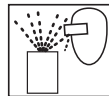
#### NEVER MODIFY THE EQUIPMENT

Do not modify the equipment unless the manufacturer provides written approval.



#### NOISE HAZARD

You may be injured by loud noise. Hearing protection may be required when using this equipment.



#### PROJECTILE HAZARD

You may be injured by venting liquids or gases that are released under pressure, or flying debris.



#### PINCH POINT HAZARD

Moving parts can crush and cut. Pinch points are basically any areas where there are moving parts.



#### STATIC CHARGE

Fluid may develop a static charge that must be dissipated through proper grounding of the equipment, objects to be sprayed and all other electrically conductive objects in the dispensing area. Improper grounding or sparks can cause a hazardous condition and result in fire, explosion or electric shock and other serious injury.



#### WEAR RESPIRATOR

Toxic fumes can cause serious injury or death if inhaled. Wear a respirator as recommended by the fluid and solvent manufacturer's Safety Data Sheet.



#### TOXIC FLUID & FUMES

Hazardous fluid or toxic fumes can cause serious injury or death if splashed in the eyes or on the skin, inhaled, injected or swallowed. LEARN and KNOW the specific hazards or the fluids you are using.



#### FIRE AND EXPLOSION HAZARD

Improper equipment grounding, poor ventilation, open flame or sparks can cause a hazardous condition and result in fire or explosion and serious injury.



#### MEDICAL ALERT

Any injury caused by high pressure liquid can be serious. If you are injured or even suspect an injury:

- Go to an emergency room immediately.
- Tell the doctor you suspect an injection injury.
- Show the doctor this medical information or the medical alert card provided with your airless spray equipment.
- Tell the doctor what kind of fluid you were spraying or dispensing.



#### GET IMMEDIATE MEDICAL ATTENTION






To prevent contact with the fluid, please note the following:

- Never point the gun/valve at anyone or any part of the body.
- Never put hand or fingers over the spray tip.
- Never attempt to stop or deflect fluid leaks with your hand, body, glove or rag.
- Always have the tip guard on the spray gun before spraying.
- Always ensure that the gun trigger safety operates before spraying.

**IT IS THE RESPONSIBILITY OF THE EMPLOYER TO PROVIDE THIS INFORMATION TO THE OPERATOR OF THE EQUIPMENT. FOR FURTHER SAFETY INFORMATION REGARDING THIS EQUIPMENT, SEE THE GENERAL EQUIPMENT SAFETY BOOKLET (77-5300).**

## 30/60-GALLON GALVANIZED TANK ASSEMBLIES – SAFEGUARDS

The following hazards may occur during the normal use of this equipment. Please read the following chart.

HAZARD	CAUSE	SAFEGUARDS
<b>Fire</b> 	Solvents and coatings can be highly flammable or combustible, especially when sprayed.	<ol style="list-style-type: none"> <li>1. Adequate exhaust must be provided to keep the air free of accumulations of flammable vapors.</li> <li>2. Smoking must never be allowed in the spray area.</li> <li>3. Fire extinguishing equipment must be present in the spray area.</li> </ol>
<b>Fire – Pressure tank</b> 	Vapors from flammable liquids can catch fire or explode.	Keep tank at least 10 feet away from sources of ignition. Ignition sources include hot objects, mechanical sparks, and arcing (non -explosion proof) electrical equipment.
<b>Explosion Hazard – Pressure Tank – Static Electricity</b> 	Static electricity is created by the flow of fluid through the pressure tank and hose. If all parts are not properly grounded, sparking may occur. Sparks can ignite vapors from solvents and the fluid being sprayed.	<ol style="list-style-type: none"> <li>1. Ground the pressure tank by connecting one end of 12 gauge (minimum) ground wire to the pressure tank and the other end to a true earth ground. Local codes may have additional grounding requirements.</li> <li>2. See illustration on page 6 for grounding and grounding hardware required.</li> </ol>
<b>Explosion Hazard – Pressure Tank – Rupture</b> 	Making changes to a pressure tank will weaken it.	<ol style="list-style-type: none"> <li>1. Never drill into, weld, or modify the tank in any way.</li> <li>2. Do not adjust, remove, or tamper with the safety valve. If replacement is necessary, use the same type and rating of valve.</li> </ol>
<b>Explosion Hazard – Galvanized Tanks – Material Compatibility</b> 	Halogenated hydrocarbon solvents – for example 1-1-1 Trichloroethane and methylene chloride – can chemically react with aluminum parts and components and cause an explosion hazard. These solvents will also corrode the galvanized tank coating.	<ol style="list-style-type: none"> <li>1. Read the label or data sheet for the material. Do not use materials containing these solvents with galvanized pressure tanks. Stainless steel tank models may be used with halogenated solvents.</li> <li>2. Refer to specifications chart to ensure that fluids are chemically compatible with the tank wetted parts. Before placing fluids or solvents in tank, always read accompanying manufacturer's literature.</li> </ol>
<b>General Safety</b>	Improper operation or maintenance may create a hazard.	Operators should be given adequate training in the safe use and maintenance of the equipment (in accordance with the requirements of NFPA-33, Chapter 15 in U.S.) Users must comply with all local and national codes governing ventilation, fire precautions, operation, maintenance, and housekeeping (in the U.S., these are OSHA sections 1910.94 and 1910.107, and NFPA-33.

### **WARNING**

High pressure can cause serious injury.

Pressure is maintained in a pressure tank after the system has been shut down.

Always follow this procedure to relieve pressure from the tank.

### **PRESSURE RELIEF PROCEDURE**

To reduce the risk of injury, follow the pressure relief procedure below

- Before checking or servicing any part of the spray system
  - Before attempting removal of fill port cap or tank cover
  - Whenever the tank is left unattended
1. Turn off the main air supply to the tank.
  2. Close the air inlet valve located on the tank air manifold.
  3. Bleed off air in the tank by turning the air relief valve (5) thumb screw counterclockwise. Wait until all the air has escaped through the valve before removing the pressure tank cover or fill port cap.
  4. Leave the air relief valve open until you have reinstalled the tank cover or fill port cap.

## 30/60-GALLON GALVANIZED TANK ASSEMBLIES – SPECIFICATIONS & OPTIONS

<b>SPECIFICATIONS</b>	
	<b>GALVANIZED TANKS</b>
<b>Maximum Working Pressure</b>	110 psi
<b>Tank Shell</b>	SA-414 Steel, Galvanized (Zinc)
<b>Tank Lid</b>	SA-285 Steel, Galvanized (Zinc)
<b>Fluid Tube</b>	3/4 in. 304 Stainless Steel Pipe
<b>Fluid Outlet (Manifold)</b>	Brass, Nickel Plate
<b>Fluid Valve, Outlet</b>	Brass, Nickel Plate 3/8-18 NPS(M)
<b>Agitator Paddle/Propeller</b>	304 Stainless Steel
<b>Agitator Shaft</b>	304 Stainless Steel
<b>Agitator Shaft Seal</b>	Engineered PTFE
<b>Air Manifold</b>	Brass, Nickel Plate
<b>Plug (Air Manifold Coupling)</b>	303 Stainless Steel
<b>Bottom Outlet (Optional Kit)</b>	1" NPT Galvanized & Stainless Steel

<b>AIR CONTROL</b>	
<b>TYPE</b>	<b>APPLICATION</b>
<b>Standard Single Regulation</b>	Provides standard fluid pressure control only. For use where precision control of both fluid and air pressures is not required. Also used where atomization air can be taken from filter/regulator air lines.

<b>AGITATION OPTIONS</b>	
<b>TYPE</b>	<b>APPLICATION</b>
<b>No Agitation</b>	Materials that require minimal or no mixing and/or readily hold any solids in suspension.
<b>Gear-reduced Drive Agitation</b>	Heavy-duty agitator for medium to high viscosity materials that require mixing and/or solids suspension.

## 30/60-GALLON GALVANIZED TANK ASSEMBLIES – OPERATION & SERVICE CHECKS

### **⚠ WARNING**

**High pressure can cause serious injury.**

**Pressure is maintained in a pressure tank after the system has been shut down.**

**Follow the pressure-relief procedure on page 3 before opening the lid or fill port or performing maintenance on the tank.**

### PREPARATION

Mix and prepare material to be used according to manufacturer's instructions. Strain material through a fine mesh screen to remove lumps, skin, and foreign matter that might enter and clog fluid passages and/or spray equipment.

Follow pressure relief procedure above.

To add material to the tank, remove the lid and pour directly into the tank or container.

If desired, a U.S. or metric 1 gallon pail of fluid can be placed directly into the tank.

Replace the lid assembly and tighten thumb screws (4) securely.

The air supply to the tank should include a filter/water separator to filter dirt from the air and remove water and oil.

Connect the material hose to the fluid outlet ball valve (22b).

### OPERATION

1. Close the air inlet valve to tank. Turn handle on regulator counterclockwise until spring tension is relieved.
2. Turn on air supply to the tank.
3. Open the air inlet valve to the tank.
4. Open the fluid outlet valve.
5. Turn handle on tank pressure regulator clockwise to pressurize tank.
6. Turn on atomization air to spray gun at source of supply.
7. Test spray. For further instructions consult literature provided with spray gun.
8. If an air motor driven agitator is used, start the agitator by slowly opening up the needle valve. Air motor speed should be regulated according to the nature of the material being agitated.
5. Loosen spray gun air cap retaining ring about three turns.
6. Turn on air supply.
7. Cup cloth over air cap on the gun and pull trigger. This will force material back through the hose into the tank.
8. Empty and clean tank and parts that come into contact with material. Use a solvent compatible with material being used.
9. Pour solvent into tank.
10. Replace lid and tighten thumb screws and clamps.
11. Spray until clean solvent appears.
12. Repeat steps 4 through 8.

### MAINTENANCE

To clean equipment, proceed as follows:

1. Turn off the air supply.
2. Follow the pressure relief procedure.
3. Turn T-handle adjusting screw on tank fluid pressure regulator counterclockwise until no spring pressure is felt.
4. Loosen thumb screws (4), tip clamps (5) back and tip lid (25) to one side of tank. Do not remove lid from tank.

### LUBRICATION – Agitated Models

Refer to the service manual provided with the air motor for lubrication information.

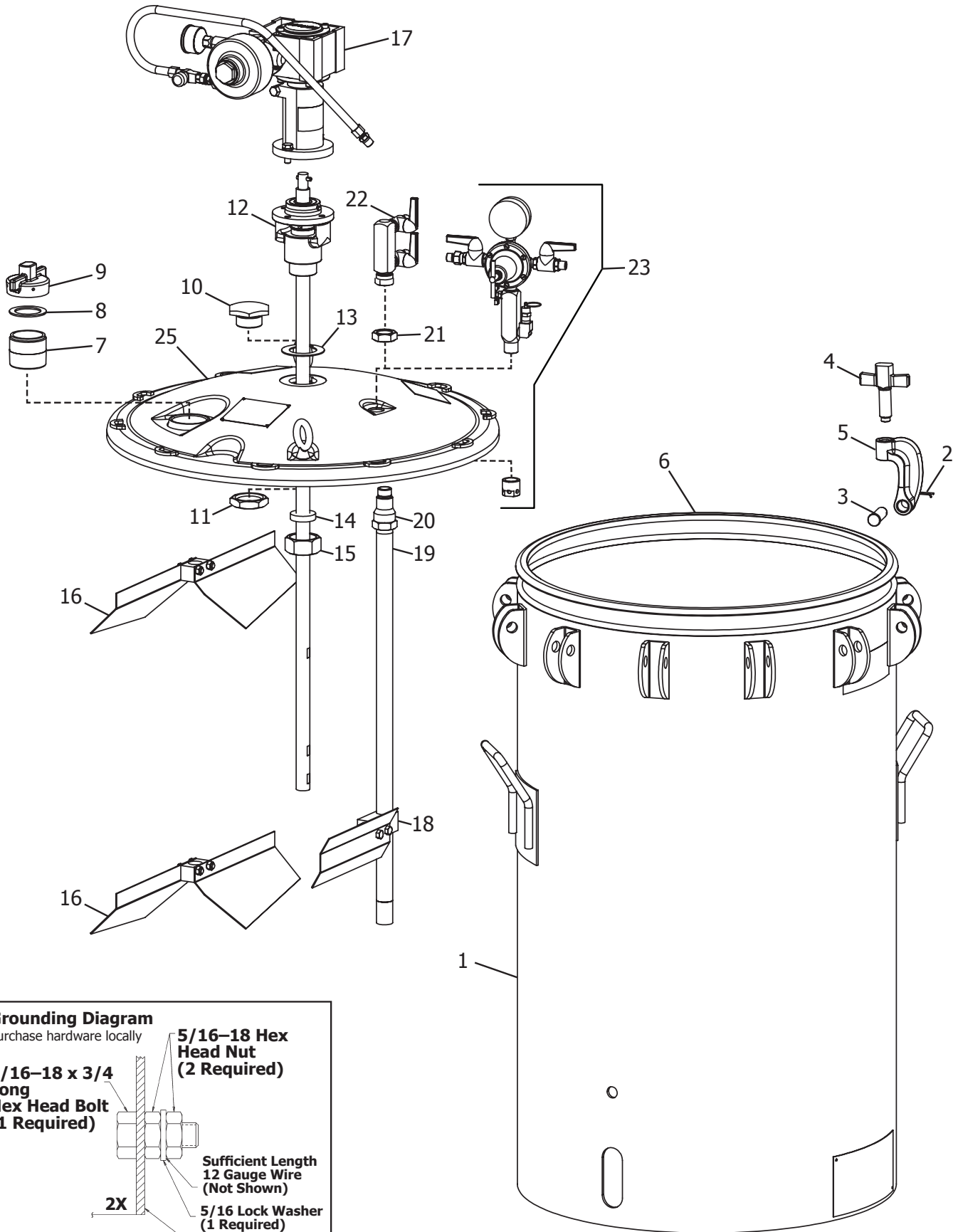
The bearings in the agitator bearing assembly are impregnated with special non-gumming oil. Additional lubrication is not required.

The agitator shaft seal does not require lubrication.

## SERVICE CHECKS

CONDITION	CAUSE	CORRECTION
<b>Air escaping from port on regulator cap.</b>	Broken or damaged diaphragm	Replace diaphragm.
<b>Pressure creepage registered on gauge.</b>	Dirty or worn valve seat in regulator.	Clean or replace valve seat.
<b>Material tends to settle out rapidly.</b>	Not enough agitation of material.	Increase agitation.
<b>Air leakage at agitator seal.</b>	Defective seal assembly.	Replace.
<b>Paint getting into bearing assembly of agitator.</b>	1. Paint level in tank too high. 2. Defective agitator shaft seal.	1. Keep fluid level under bearing ass'y. 2. Replace
<b>Fluid or air leak at lid gasket.</b>	1. Thumb screw not tight. 2. Defective lid gasket.	1. Tighten. 2. Replace.
<b>Fluid or air leak at fill port gasket.</b>	1. Fill port cap not tight. 2. Defective fill port gasket.	1. Tighten. 2. Replace.
<b>Air mixing with paint</b>	1. Fluid tube not sealed to lid. 2. Excessive agitation.	1. Tighten fluid tube into lid. 2. Reduce speed of agitator.

60-GALLON GALVANIZED TANK ASSEMBLIES



**Grounding Diagram**  
 Purchase hardware locally

5/16-18 x 3/4 Long Hex Head Bolt (1 Required)

5/16-18 Hex Head Nut (2 Required)

Sufficient Length 12 Gauge Wire (Not Shown)

5/16 Lock Washer (1 Required)

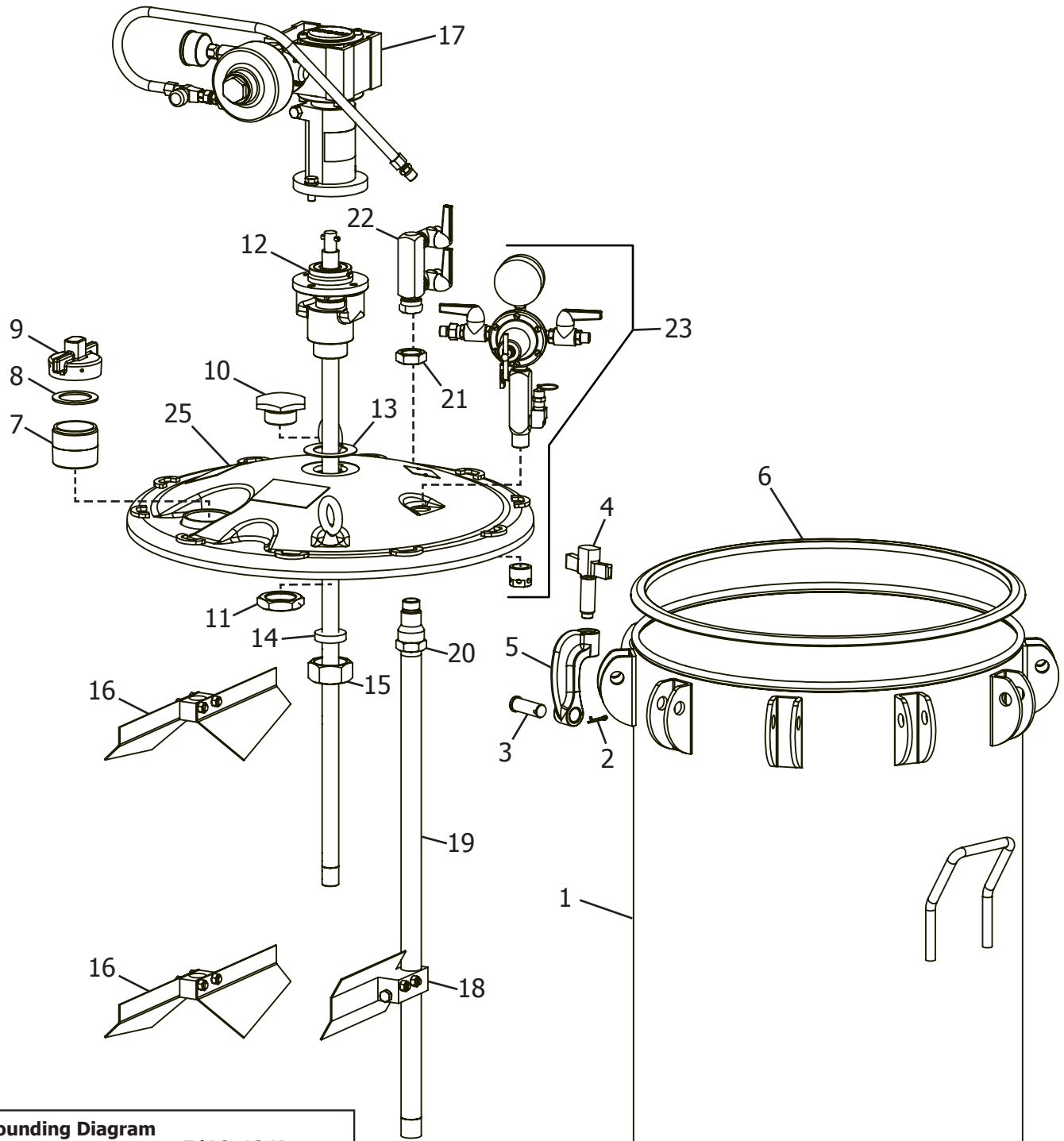
Tank Skirt (Ref)

2X

## 60-GALLON GALVANIZED TANK ASSEMBLIES – PARTS LIST

ITEM NO.	PART NO.	DESCRIPTION	83-5701 QTY.	83-5707 QTY.	REF. PART SHEET
1	—	SHELL	1	1	
2	20-1242	COTTER PIN	12	12	
3	83-1436	CLEVIS PIN	12	12	
4	83-1434	CLAMP SCREW	12	12	
5	83-1433	C CLAMP	12	12	
6	83-2122	HEAD GASKET	1	1	
7	83-1731	NIPPLE	1	1	
8	83-1208	GASKET	1	1	
9	83-569	FILLER CAP	1	1	
10	83-1497	PLUG	1	—	
11	83-1474	LOCKNUT	1	—	
12	83-2116	STUFFING BOX ASSEMBLY	—	1	
13	83-1472	GASKET	1	1	
14	83-2117	FELT WASHER	—	1	
15	83-2119	LOCKNUT	—	1	
16	83-2138	PADDLE ASSEMBLY	—	2	
17	31-455	AIR MOTOR DRIVE	—	1	77-3139
18	83-2140	STATIONARY PADDLE ASSEMBLY	—	1	
19	83-2127	FLUID TUBE	1	1	
20	83-2129	FLUID TUBE ADAPTER	1	1	
21	83-2130	FLUID TUBE NUT	1	1	
22	83-2723	TOP OUTLET ASSEMBLY	1	1	
23	85-203	AIR CONTROL ASSEMBLY	1	1	77-1827
24	—	PLUG, 1" NPT (NOT SHOWN)	1	1	
25	—	HEAD ASSEMBLY	1	1	

30-GALLON GALVANIZED TANK ASSEMBLIES



**Grounding Diagram**  
 Purchase hardware locally

**5/16-18 x 3/4 Long Hex Head Bolt (1 Required)**

**5/16-18 Hex Head Nut (2 Required)**

Sufficient Length  
 12 Gauge Wire  
 (Not Shown)

**5/16 Lock Washer (1 Required)**

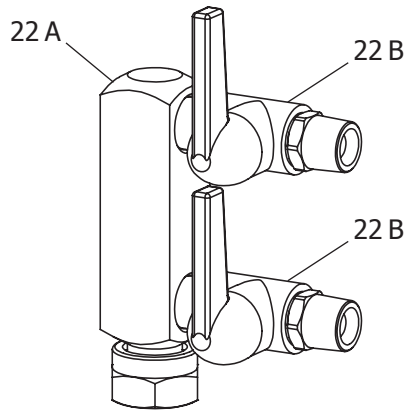
Tank Skirt (Ref)



### 30-GALLON GALVANIZED TANK ASSEMBLIES – PARTS LIST

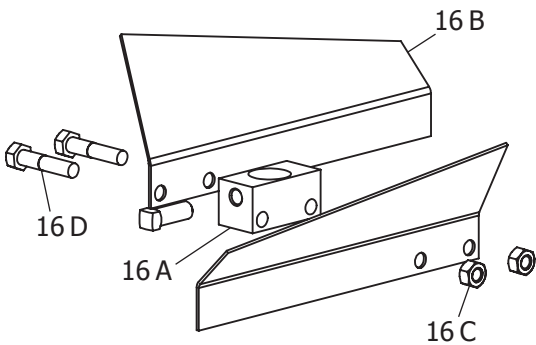
ITEM NO.	PART NO.	DESCRIPTION	83-5801 QTY.	83-5807 QTY.	REF. PART SHEET
1	—	SHELL	1	1	
2	20-1242	COTTER PIN	10	10	
3	83-1436	CLEVIS PIN	10	10	
4	83-1434	CLAMP SCREW	10	10	
5	83-1433	C CLAMP	10	10	
6	83-2120	HEAD GASKET	1	1	
7	83-1731	NIPPLE	1	1	
8	83-1208	GASKET	1	1	
9	83-569	FILLER CAP	1	1	
10	83-1497	PLUG	1	—	
11	83-1474	LOCKNUT	1	—	
12	83-2114	STUFFING BOX ASSEMBLY	—	1	
13	83-1472	GASKET	1	1	
14	83-2117	FELT WASHER	—	1	
15	83-2119	LOCKNUT	—	1	
16	83-2197	PADDLE ASSEMBLY	—	2	
17	31-455	AIR MOTOR DRIVE	—	1	77-3139
18	83-2199	STATIONARY PADDLE ASSEMBLY	—	1	
19	83-2125	FLUID TUBE	1	1	
20	83-2129	FLUID TUBE ADAPTER	1	1	
21	83-2130	FLUID TUBE NUT	1	1	
22	83-2723	TOP OUTLET ASSEMBLY	1	1	
23	85-203	AIR CONTROL ASSEMBLY	1	1	77-1827
24	—	PLUG, 1" NPT (NOT SHOWN)	1	1	
25	—	HEAD ASSEMBLY	1	1	

**83-2723 TOP OUTLET ASSEMBLY (ITEM 22)**



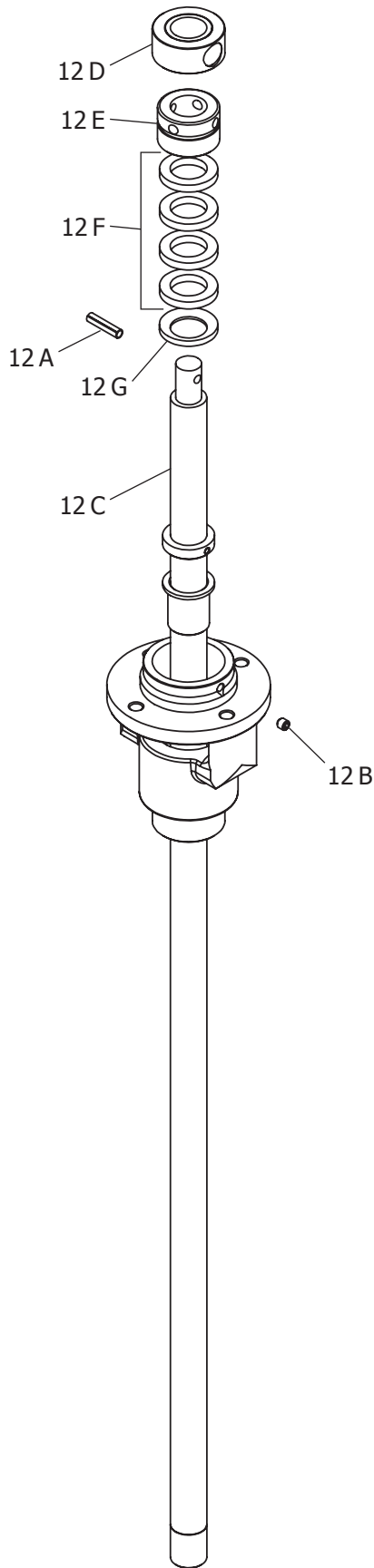
ITEM NO.	PART NO.	DESCRIPTION	QTY.
22 A	72-994	MANIFOLD	1
22 B	72-84040	BALL VALVE, 3/8" X 3/8"	2

**83-2197 (30-GAL) & 83-2138 (60-GAL) PADDLE ASSEMBLIES (ITEM 16)**



ITEM NO.	PART NO.	DESCRIPTION	83-2197 QTY.	83-2138 QTY.
16 A	83-2132	BLOCK	1	1
16 B	83-2194	PADDLE, 30-GAL	1	—
	83-2135	PADDLE, 60-GAL	—	1
16 C	20-1741	SET SCREW, 3/8-16 x 1	1	1
16 D	20-2077	CAP SCREW, 5/16-18 x 1-1/2	2	2
16 E	20-2079	NUT, 5/16-18	2	2

**83-2114 (30-GAL) & 83-2116 (60-GAL) STUFFING BOX ASSEMBLIES (ITEM 12)**



ITEM NO.	PART NO.	DESCRIPTION	83-2114 QTY.	83-2116 QTY.
12 A	83-1211	PIN	1	1
12 B	20-1237	SET SCREW	1	1
12 C	83-2099	SHAFT ASSY, 30-GAL	1	—
	83-2104	SHAFT ASSY, 60-GAL	—	1
12 D	83-2107	BEARING	1	1
12 E	83-2112	PACKING GLAND	1	1
12 F	83-2111	PACKING	4	4
12 G	83-2110	PACKING WASHER	1	1

**WARRANTY POLICY**

This product is covered by Carlisle Fluid Technologies’ materials and workmanship limited warranty. The use of any parts or accessories, from a source other than Carlisle Fluid Technologies, will void all warranties. Failure to reasonably follow any maintenance guidance provided may invalidate any warranty.

For specific warranty information please contact Carlisle Fluid Technologies.

Carlisle Fluid Technologies is a global leader in innovative finishing technologies. Carlisle Fluid Technologies reserves the right to modify equipment specifications without prior notice.

DeVilbiss®, Ransburg®, ms®, BGK®, and Binks® are registered trademarks of Carlisle Fluid Technologies, Inc.

©2020 Carlisle Fluid Technologies, Inc.  
All rights reserved.

For technical assistance or to locate an authorized distributor, contact one of our international sales and customer support locations.

<b>Region</b>	<b>Industrial / Automotive</b>	<b>Automotive Refinishing</b>
Americas	Tel: 1-800-992-4657 Fax: 1-888-246-5732	Tel: 1-800-445-3988 Fax: 1-800-445-6643
Europe, Africa, Middle East, India	Tel: +44 (0)1202 571 111 Fax: +44 (0)1202 573 488	
China	Tel: +8621-3373 0108 Fax: +8621-3373 0308	
Japan	Tel: +81 45 785 6421 Fax: +81 45 785 6517	
Australia	Tel: +61 (0) 2 8525 7555 Fax: +61 (0) 2 8525 7575	

For the latest information about our products, visit [www.carlisleleft.com](http://www.carlisleleft.com)