

# Fluid Mix Manifold

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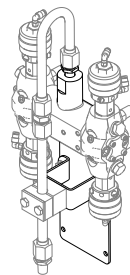
***For proportional mixing of plural component coatings with a ProMix® V package meter proportioner. For professional use only.***

See page 3 for model information, including maximum working pressure.

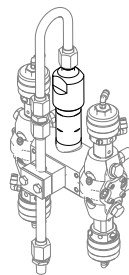


## Important Safety Instructions

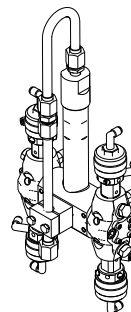
Read all warnings and instructions in this manual before using the equipment. Be familiar with the proper control and usage of the equipment. Save these instructions.



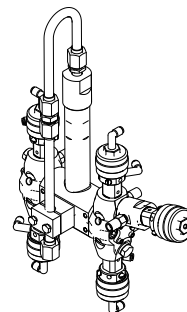
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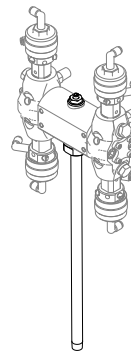
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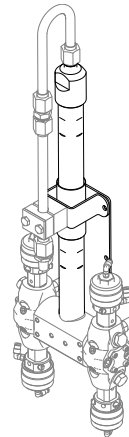
25U507



25U508



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# Related Manuals

Find English manuals and any available translations at [www.graco.com](http://www.graco.com).

English Manual Number	Description
312782	Air Actuated Dispense Valve Instructions-Parts
3B0203	ProMix V Package Meter Proportioner Installation-Operation
3B0361	ProMix V Package Meter Proportioner Repair-Parts









# Models

<b>Part</b>	<b>Maximum Working Pressure psi (MPa, bar)</b>	<b>Description</b>	<b>Standard Integrator Size</b>
25U507	4000 psi (28.0 MPa, 280 bar)	Manifold, Integrator, Mix, 2K, No Sampling	50 cc
25U508	3000 psi (20.7 MPa, 207 bar)	Manifold, Integrator Mix, 2K, Acid	

# Safety Symbols

The following safety symbols appear throughout this manual and on warning labels. Read the table below to understand what each symbol means.

Symbol	Meaning
	Equipment Misuse Hazard
	Fire and Explosion Hazard
	Moving Parts Hazard
	Pressurized Equipment Hazard
	Skin Injection Hazard
	Skin Injection Hazard
	Splatter Hazard
	Splash Hazard
	Toxic Fluid or Fumes Hazard

Symbol	Meaning
	Ground Equipment
	Follow Pressure Relief Procedure
	Read Manual
	Ventilate Work Area
	Wear Personal Protective Equipment
	Do Not Stop Leaks with Hand, Body, Glove or Rag
	Do Not Place Hands or Other Body Parts Near Fluid Outlet
	Eliminate Ignition Sources



### Safety Alert Symbol







This symbol indicates: Attention! Become Alert! Look for this symbol throughout the manual to indicate important safety messages.

# General Warnings

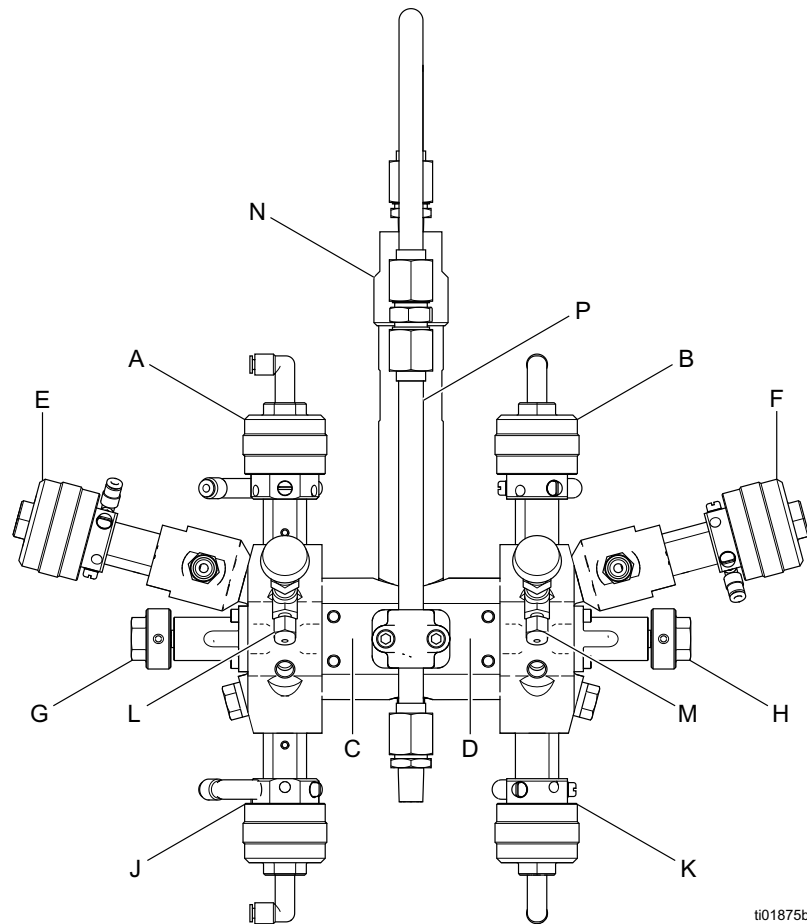
The following warnings apply throughout this manual. Read, understand, and follow the warnings before using this equipment. Failure to follow these warnings can result in serious injury.

 <h2 style="margin: 0;">WARNING</h2>	
   	<p><b>FIRE AND EXPLOSION HAZARD</b></p> <p>Flammable fumes, such as solvent and paint fumes, in <b>work area</b> can ignite or explode. Paint or solvent flowing through the equipment can cause static sparking. To help prevent fire and explosion:</p> <ul style="list-style-type: none"> <li>• Use equipment only in well-ventilated area.</li> <li>• Eliminate all ignition sources, such as pilot lights, cigarettes, portable electric lamps, and plastic drop cloths (potential static sparking).</li> <li>• Ground all equipment in the work area. See <b>Grounding</b> instructions.</li> <li>• Never spray or flush solvent at high pressure.</li> <li>• Keep work area free of debris, including solvent, rags and gasoline.</li> <li>• Do not plug or unplug power cords, or turn power or light switches on or off when flammable fumes are present.</li> <li>• Use only grounded hoses.</li> <li>• Hold gun firmly to side of grounded pail when triggering into pail. Do not use pail liners unless they are anti-static or conductive.</li> <li>• <b>Stop operation immediately</b> if static sparking occurs or you feel a shock. Do not use equipment until you identify and correct the problem.</li> <li>• Keep a working fire extinguisher in the work area.</li> </ul>
    	<p><b>SKIN INJECTION HAZARD</b></p> <p>High-pressure fluid from gun, hose leaks, or ruptured components will pierce skin. This may look like just a cut, but it is a serious injury that can result in amputation. <b>Get immediate surgical treatment.</b></p> <ul style="list-style-type: none"> <li>• Do not spray without tip guard and trigger guard installed.</li> <li>• Engage trigger lock when not spraying.</li> <li>• Do not point gun at anyone or at any part of the body.</li> <li>• Do not put your hand over the spray tip.</li> <li>• Do not stop or deflect leaks with your hand, body, glove, or rag.</li> <li>• Follow the <b>Pressure Relief Procedure</b> when you stop spraying and before cleaning, checking, or servicing equipment.</li> <li>• Tighten all fluid connections before operating the equipment.</li> <li>• Check hoses and couplings daily. Replace worn or damaged parts immediately.</li> </ul>

# ! WARNING

  	<p><b>PRESSURIZED EQUIPMENT HAZARD</b></p> <p>Fluid from the equipment, leaks, or ruptured components can splash in the eyes or on skin and cause serious injury.</p> <ul style="list-style-type: none"> <li>• Follow the <b>Pressure Relief Procedure</b> when you stop spraying/dispensing and before cleaning, checking, or servicing equipment.</li> <li>• Tighten all fluid connections before operating the equipment.</li> <li>• Check hoses, tubes, and couplings daily. Replace worn or damaged parts immediately.</li> </ul>
	<p><b>PERSONAL PROTECTIVE EQUIPMENT</b></p> <p>Wear appropriate protective equipment when in the work area to help prevent serious injury, including eye injury, hearing loss, inhalation of toxic fumes, and burns. Protective equipment includes but is not limited to:</p> <ul style="list-style-type: none"> <li>• Protective eyewear, and hearing protection.</li> <li>• Respirators, protective clothing, and gloves as recommended by the fluid and solvent manufacturer.</li> </ul>
 	<p><b>EQUIPMENT MISUSE HAZARD</b></p> <p>Misuse can cause death or serious injury.</p> <ul style="list-style-type: none"> <li>• Do not operate the unit when fatigued or under the influence of drugs or alcohol.</li> <li>• Do not exceed the maximum working pressure or temperature rating of the lowest rated system component. See <b>Technical Specifications</b> in all equipment manuals.</li> <li>• Use fluids and solvents that are compatible with equipment wetted parts. See <b>Technical Specifications</b> in all equipment manuals. Read fluid and solvent manufacturer's warnings. For complete information about your material, request Safety Data Sheets (SDSs) from distributor or retailer.</li> <li>• Do not leave the work area while equipment is energized or under pressure.</li> <li>• Turn off all equipment and follow the <b>Pressure Relief Procedure</b> when equipment is not in use.</li> <li>• Check equipment daily. Repair or replace worn or damaged parts immediately with genuine manufacturer's replacement parts only.</li> <li>• Do not alter or modify equipment. Alterations or modifications may void agency approvals and create safety hazards.</li> <li>• Make sure all equipment is rated and approved for the environment in which you are using it.</li> <li>• Use equipment only for its intended purpose. Call your distributor for information.</li> <li>• Route hoses and cables away from traffic areas, sharp edges, moving parts, and hot surfaces.</li> <li>• Do not kink or over bend hoses or use hoses to pull equipment.</li> <li>• Keep children and animals away from work area.</li> <li>• Comply with all applicable safety regulations.</li> </ul>

# Component Identification



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**FIG. 1**

**Key:**

- A Dose Valve A
- B Dose Valve B
- C Check Valve A
- D Check Valve B
- E Dump Valve A (Optional)
- F Dump Valve B (Optional)
- G Isolation Valve A (Optional)
- H Isolation Valve B (Optional)
- J Purge Valve A
- K Purge Valve B
- L Sample Valve A (Optional)
- M Sample Valve B (Optional)
- N Integrator
- P Mixer

# Installation

## Air Connections

See **Component Identification**, page 7.




1. Connect 5/32 in. (4 mm) OD air tubes from the valve solenoids to the air inlets of each valve.
2. Connect an air supply line to air purge valve (J) inlet (1/4 in. ID tube is supplied, with tag).
3. Pressurize the system with air, and check for leaks, then relieve air pressure.

## Fluid Connections

See **Component Identification**, page 7.

1. Connect the solvent supply line to the 1/4 npt(f) solvent purge valve (K) inlet.
2. Connect the component A supply line to the meter A 1/4 npt(f) inlet.
3. Connect the component B supply line to the meter B 1/4 npt(f) inlet.
4. Connect the gun fluid supply line between the mixer (P) and the gun fluid inlet.

## Grounding

				
The equipment must be grounded to reduce the risk of static sparking. Static sparking can cause fumes to ignite or explode. Grounding provides an escape wire for the electric current.				

Connect a ground wire from a true earth ground to the mix manifold or the mix manifold mounting surface if there is electrical continuity between it and the mix manifold.

Follow the specific grounding instructions in the system and individual component manuals. The system may have special grounding requirements for the mix manifold. See **Related Manuals**, page 2.

A ground wire and clamp, part no. 238909, is available from Graco.

## Flush Before Using Equipment

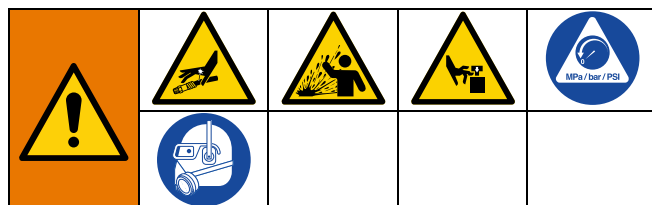
The equipment was tested with lightweight oil, which is left in the fluid passages to protect parts. To avoid contaminating your fluid with oil, flush the equipment with a compatible solvent before using the equipment. See **Flushing Procedure**, page 9.

# Operation

## Pressure Relief Procedure



Follow the Pressure Relief Procedure whenever you see this symbol.



This equipment stays pressurized until pressure is manually relieved. To help prevent serious injury from pressurized fluid, such as skin injection, splashing fluid and moving parts, follow the Pressure Relief Procedure when you stop spraying and before cleaning, checking, or servicing the equipment.

To relieve pressure in your manifold, follow the **Pressure Relief Procedure** in your ProMix V Package Meter Proportioner Installation-Operation manual. See **Related Manuals**, page 2.

## Flushing Procedure



Follow the Flushing procedure in your ProMix Proportioner Operation manual. See **Related Manuals**, page 2.

- Flush before changing colors, before fluid can dry in the equipment, at the end of the day, before storing, and before repairing equipment.
- Flush at the lowest pressure possible. Check connections for leaks and tighten as necessary.
- Flush with a fluid that is compatible with the fluid being dispensed and the equipment wetted parts.

<b>NOTICE</b>
<p>Flush the sampling valves with solvent immediately after using them to prevent material from hardening inside the fluid passages and damaging the sampling tube.</p>

## Operation Guidelines

Manifold operation is dependent on the system it is connected to. Follow the system operation instructions.

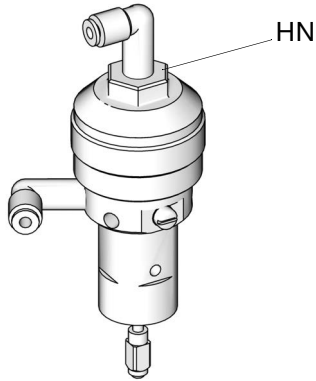
**NOTE:** After the system has been shut down for a period of time, it is normal for component solenoids and valves to cycle rapidly until system pressure is built back up when restarted.

- **Purge air from fluid lines** when components are loaded.
- **Adjust fluid supply pressure** if the fluid output is too low or too high.
- **Adjust flow rate** with fluid supply pressure regulators (optional) or dispense valves. Flow rate should be the same at the spray gun regardless of which component dispense valves are open. Pressure adjustments of each component will vary with fluid viscosity. Start with the same fluid pressures, then adjust as needed. See **Mix Manifold Valve Settings**, page 10.
- **Adjust gun atomizing air pressure** as needed.

**NOTE:** Do not use the first 4-5 oz. (120-150 cc) of material as it may not be thoroughly mixed due to priming the system.

## Mix Manifold Valve Settings

To increase flow of dose or purge valves, turn hex nut (HN) counterclockwise. To decrease flow of dose, turn clockwise. FIG. 2.



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**FIG. 2: Dispense Valve Adjustment**

**Table 1: Mix Manifold Valve Settings**

Valve	Setting	Function
Dose Purge	Hex nut (HN) 1-1/4 turns out from fully closed	Limits maximum fluid flow rate into integrator and minimizes valve response time.
Shutoff	Fully open during Run/Mix operation	Closes component ports to integrator during ratio check or meter calibration. Open ports during Run/Mix operation.
Sampling	Fully closed during Run/Mix operation	Open to dispense components while calibrating meters. Do not open sampling valves unless fluid shutoff valves are closed.

## Maintenance

### Daily

- Purge the mixing system at the end of production.
- Visually check and refill fluid supplies for all components and solvent.
- Visually inspect the manifold and fluid line components for leaks.
- Make sure meter cables and air pilot lines are securely connected.
- Visually check that there is no fluid in the air purge line.

### Weekly

- Clean and inspect the integrator mixer assembly. Follow **Remove the Integrator Mixer**, page 13. Ensure that the mixer (9) holes are not clogged. The cleaning frequency required depends on the fluid being mixed.
- Clean and inspect fluid and air filters.

### Preventive Maintenance Schedule

At least once a year, take apart the mix manifold and dose/purge valves and sampling valves. Clean and inspect them. Replace o-rings and seals. Repair kits are available from Graco. See **Repair**, page 13.

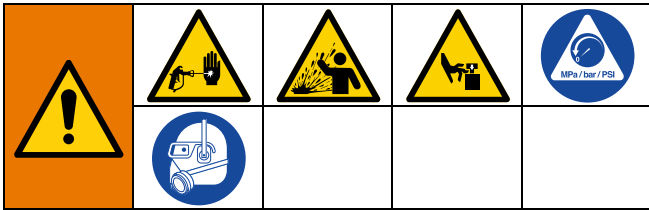
## Recycling and Disposal

### End of Product Life

At the end of the product's useful life, dismantle and recycle it in a responsible manner.

- Perform the **Pressure Relief Procedure**, page 9.
- Drain and dispose of fluids according to applicable regulations. Refer to the material manufacturer's Safety Data Sheet.
- Deliver remaining product to a recycling facility.

# Troubleshooting



Follow **Pressure Relief Procedure**, page 9, before checking or repairing the equipment.

**NOTE:** Check all possible problems and causes before disassembling the equipment.

## Isolate a Mixing Problem

A mixing problem can be caused by a problem with the controller, meters, and solenoid valves, as well as the mix manifold.

1. To isolate the problem, check for any visible faults or errors:
  - a. Are all air and fluid tubes, hoses, and electrical cables properly connected and free of kinks?
  - b. Are valves and controls properly set?
  - c. Do the fluid supplies, solenoids, and spray gun have sufficient air pressure?
  - d. Do the fluid supplies need refilling?
2. If there is a process control problem, refer to your controller manual.

## Common Causes

- The flow rate is too high.
- The flow rate is too high only during fill, with regulator override on and/or the gun needle removed.
- Highly unbalanced pressures from the fluid supply system.
- Slow actuation of component A or B dispense valves.
- System leaks.

## Unbalanced Pressure

1. Check all component fluid supply pressures.
2. If the fluid supply pressures are not about equal, adjust their fluid pressure regulators, until the pressures are about the same.
3. If the pressures are already about equal, verify that the dose valves are operating properly.
4. Make sure the dose valves are opened the same amount. If there is a difference in viscosity, adjust the dose valves and open them wider to compensate for higher viscosity fluid.

## Dose Valve Operation

Manually operate the dose valves by actuating their solenoids. The valves should snap open and shut quickly. If the valves move slowly, it could be caused by:

- Air pressure to the valve actuators is too low.  
*Minimum: 80 psi (0.55 MPa, 5.5 bar)*  
*Recommended: 90 psi (0.62 MPa, 6.2 bar).*
- Air pressure to the ProMix V Package Meter Proportioner is too high.  
*Maximum: 100 psi (0.69 MPa, 6.9 bar)*  
*(excessive pressure may keep solenoids closed)*
- Valve actuating air constricted by dirt or water in the air supply.
- Solenoid or tubing restricted.
- Dose valve seals need lubrication (see manual 312782).
- Air piston o-rings and packings are not lubricated (see manual 312782).
- Valve setting is turned out too far. See **Mix Manifold Valve Settings**, page 10.

# Repair



**NOTE:** Purge the mix manifold with solvent after repair to remove any excess grease that is used for lubricating parts.

## Remove the Integrator Mixer

A Mix Cleaning Repair Kit (2008501) is available. Parts included in the Mix Cleaning Repair Kit (2008501) are marked with \*.

See the **Parts** drawings starting on page 15. Clean and inspect all parts. Apply pipe sealant to all pipe threads when reassembling.

1. Follow the **Pressure Relief Procedure**, page 9.
2. Remove the outlet tube assembly (24 and 26 together) from the fitting (23) on top of the integrator cap (12).
3. Remove integrator housing (10), leaving the cap and fitting in place.
4. Cleaning the housing is not usually necessary. If cleaning is required, remove the cap and o-ring (20).
5. Remove the o-ring (20) in the mix manifold.
6. Inspect the integrator (9) and make sure the holes are not clogged.
7. Reassemble with new o-rings.

## Repair the Valves and Seats

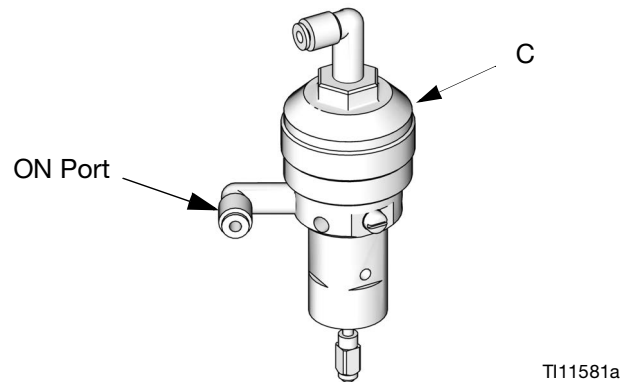
A Dose and Purge Valve Repair Kit (2008505), and Acid Dose and Purge Valve Repair Kit (2008506) are available.

Parts included in the Dose and Purge Valve Repair Kit (2008505) are marked with ‡. Parts included in the Acid Dose and Purge Valve Repair Kit (2008506) are marked with ✓. For best results, use all parts included in the kit.

See the **Parts** drawings starting on page 15. Clean and inspect all parts. Apply pipe sealant to all pipe threads when reassembling.

1. Follow the **Pressure Relief Procedure**, page 9.
2. Disconnect the fluid line from the valve adapter (17).
3. Disconnect the air lines from the valve (19).
4. Unscrew the cap (C) to remove spring pressure on the valve. See FIG. 3.

**NOTE:** Another method of removing spring pressure is by applying air to the ON port, to lift the valve needle off the seat.



**FIG. 3. Dispense Valve Cap**

5. Unscrew the valve (13,46,50) using the flats.
6. Remove the o-ring (15).
7. With a hex key (10mm), unscrew the seat (3, 45). Remove the o-ring (4).

**NOTE:** See manual 312782 to repair the valve.

8. Install new o-ring (4), seat (3, 45), and o-ring (15).
9. Install the valve and cap (13, 46, 50). See the Air Actuated Dispense Valve Instructions-Parts manual to adjust the spring tension and needle travel. See **Component Identification**, page 7.
10. Reconnect the fluid and air lines.

## Rebuild the Mix Manifold

A Mix Manifold Rebuild Kit (2008503), and Acid Mix Manifold Rebuild Kit (2008504) are available.

Parts included in the Mix Manifold Rebuild Kit (2008503) are marked with ♦. Parts included in the Acid Mix Manifold Rebuild Kit (2008504) are marked with †. For best results, use all parts included in the kit.

See the **Parts** drawings starting on page 15. Clean and inspect all parts. Apply pipe sealant to all pipe threads when reassembling.

1. Follow the **Pressure Relief Procedure**, page 9.
2. Follow steps 2-7 under **Repair the Valves and Seats**, page 13. Do this for each of the valves.
3. Replace fittings (5) and o-rings (6) as necessary.
4. Remove the four screws and blanking plug from the side mix manifold (2). Remove the o-ring.
5. Remove the two screws that hold on the side mix manifold (2), and remove the side mix manifold. If the screws are damaged, discard.
6. Remove the check valve (7) and o-ring (21).
7. Remove the integrator plug and o-ring. Remove the housing and integrator.
8. Thoroughly clean and inspect all parts.
9. Reassemble the mix manifold following the steps in reverse.

**NOTE:** Use new o-rings when reassembling the mix manifold.

## Replace the Outlet Tube and Static Mixer Tube

A J-Pipe Repair Kit (2008502) is available. Parts included in the J-Pipe Repair Kit (2008502) are marked with ◆. For best results, use all parts included in the kit.

See the **Parts** drawings starting on page 15. If the outlet tube (21) or the static mixer tube (24) need replacement, both must be replaced.

1. Follow the **Pressure Relief Procedure**, page 9.
2. Remove any fittings and air lines from the end of the straight tube (26) and adapter (23).
3. Remove screws (30), cover (43), and body clamp (29).
4. Remove the tube assembly from the adapter (23) on top of the cap (12). Do not loosen the adapter.
5. With new parts, assemble the static mixers into each tube. Torque the straight tube (26) and loop tube (24) together with the fitting (25). The tube connections must be finger tight before applying torque in order to seat properly.
6. Torque the adapter (23) to the straight tube (26).
7. Torque the tube assembly onto the adapter (23) on the mix manifold assembly. Make sure the orientation is correct and connections are finger tight before applying torque.
8. Assemble the clamp (29) and cover (43) with two screws (30).

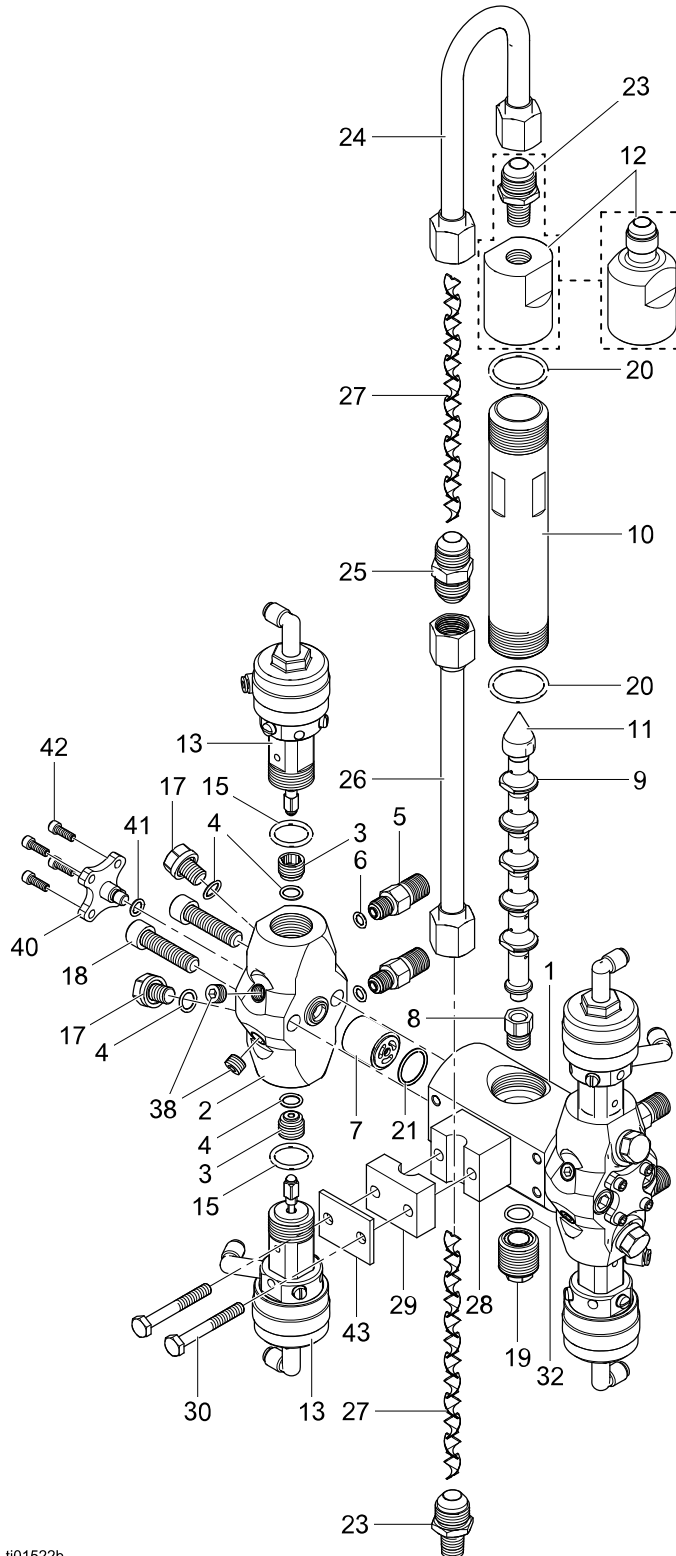
## Replace Parts if Mix Material Cures Inside the Mix Manifold

A Cured Mix Manifold Repair Kit (2008507) is available. Parts included in the Cured Mix Manifold Repair Kit (2008507) are marked with ★. For best results, use all parts included in the kit.

See the **Parts** drawings starting on page 15. Clean and inspect all parts. Apply pipe sealant to all pipe threads when reassembling.

# Parts

## 25U507, Mix Manifold



ti01522b

## 25U507

Ref.	Part	Description	Qty	Ref.	Part	Description	Qty
1★	---	MANIFOLD, MIX, CENTER, 2KS	1	38	110208	PLUG,PIPE,HEADLESS	4
2	---	MANIFOLD, MIX, SIDE, 2KS	2	40	---	PLUG,BLANKING, CALIBRATION SHUTOFF VALVE	2
3❖†#✓	15T725	RETAINER, SEAT, DUMP VALVE	4	41❖†	2004116	PACKING,O-RING,PTFE,Ø0.270 I.D. X .070	2
4❖†#✓	111457	PACKING,O-RING	8	42	124057	SCREW,CAP,SH,8-32X0.5L G, SST	8
5❖†	24T523	FITTING, FLUID, MANIFOLD	4	43	110831	COVER,CLAMP, INTEGRATOR TUBE	1
6❖†	104893	PACKING, O RING	4				
7❖†★	16D658	VALVE, CHECK	2				
8❖†★	---	ADAPTER,INTEGRATOR, MANIFOLD,FTR	1				
9★	---	MIXER,INTEGRATOR, 50CC	1				
10★	---	HOUSING,INTEGRATOR, 50CC	1				
11★	---	CAP,MIX,INTEGRATOR	1				
12★	---	CAP,INTEGRATOR	1				
13†✓	15X303	VALVE,DISPENSE,HP	4				
15❖†#✓★	15Y627	PACKING,O-RING #2-116, PTFE	4				
17	---	PLUG,SIDE,MIX MANIFOLD	4				
18❖†★	110141	SCREW,CAP,SCH	4				
19❖†★	---	PLUG,INTEGRATOR MANIFOLD	1				
20*❖†★	110966	PACKING,O-RING	2				
21❖†#✓★	110135	PACKING,O-RING, PTFE	2				
23◆★	123598	ADAPTER,1/2 JIC X 1/4 NPT	2				
24◆★	---	TUBE,LOOP,STATIC MIXER,JIC37	1				
25◆★	125781	FITTING,UNION,08 JIC X 08 JIC,SST	1				
26◆★	---	TUBE, STRAIGHT, STAT MIXER, JIC37	1				
27◆★	118822	MIXER,STATIC,SS	2				
28	---	SPACER,PUMP, MIX TUBE	1				
29	118830	CLAMP,BODY, INTEGRATOR TUBE	1				
30	129531	SCREW,CAP HEX HD	2				
32*❖†★	104319	PACKING,O-RING	1				
34	---	LUBRICANT,GREASE	1				
35	---	SEALANT,PIPE,SST	1				
36	---	SEALANT, ANAEROBIC, BLUE	1				

\* Parts included in Mix Cleaning Repair Kit, 2008501.

◆ Parts included in J-Pipe Repair Kit, 2008502.

❖ Parts included in Mix Manifold Rebuild Kit, 2008503.

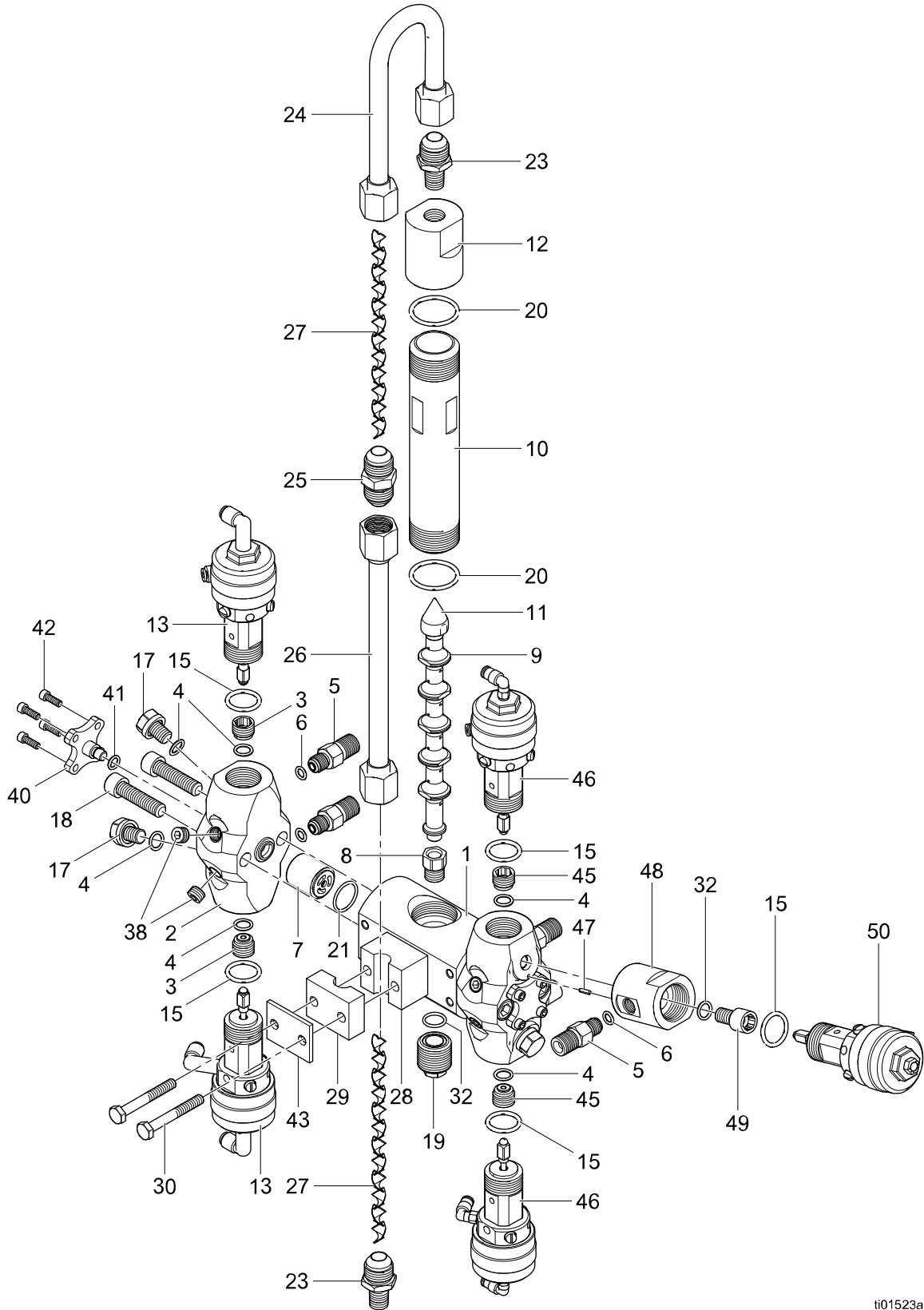
† Parts included in Acid Mix Manifold Rebuild Kit, 2008504.

‡ Parts included in Dose and Purge Valve Repair Kit, 2008505.

✓ Parts included in Acid Dose and Purge Valve Repair Kit, 2008506.

★ Parts included in Cured Mix Manifold Repair Kit, 2008507.

### 25U508, Acid Mix Manifold



ti01523a

## 25U508

Ref.	Part	Description	Qty	Ref.	Part	Description	Qty
1★	---	MANIFOLD, MIX, CENTER, 2KS	1	36	---	ADHESIVE,THREAD LOCKER,LOCTITE 242	1
2	---	MANIFOLD,MIX,SIDE,2KS	2	37	---	VALVE,NEEDLE 1/8NPT X 1/8T SS	1
3❖†#✓	15T725	RETAINER,SEAT, DUMP VALVE	4	38	---	PLUG,PIPE,HEADLESS	3
4❖†#✓	111457	PACKING,O-RING	8	39	---	VALVE,CALIBRATION SHUTOFF	1
5❖†	24T523	FITTING,FLUID, MANIFOLD	5	40	---	PLUG,BLANKING, CALIBRATION SHUTOFF VALVE	1
6❖†	104893	PACKING,O RING	5	41❖†	---	PACKING,O-RING,PTFE,Ø0 .270 I.D. X .070	1
7❖†★	24Y516	VALVE,CHECK, ACID	2	42	---	SCREW,CAP,SH,8-32X0.5L G,SST	4
8❖†★	---	ADAPTER, INTEGRATOR, MANIFOLD, FTR	1	43	---	COVER,CLAMP, INTEGRATOR TUBE	1
9★	---	MIXER,INTEGRATOR, 50CC	1	45†✓	2009136	RETAINER, seat, valve, peek	2
10★	---	HOUSING,INTEGRATOR, 50CC	1	46✓	24t785	VALVE, dispense, hp, acid	2
11★	---	CAP,MIX,INTEGRATOR	1	47✓	---	PIN, dowel	1
12★	---	CAP,INTEGRATOR	1	48✓	---	FITTING, valve, sample, mix manifold	1
13†✓	15X303	VALVE,DISPENSE,HP	4	49✓	---	BOLT, manifold	1
14	---	FITTING,VALVE,SAMPLE,M IX MANIFOLD	1	50✓	26a313	VALVE, color change, acid	1
15❖†#✓★	15Y627	PACKING,O-RING #2-116, PTFE	5				
16	---	VALVE,DISPENSE,4K	1				
17	---	PLUG,SIDE,MIX MANIFOLD,2KS	3				
18❖†★	110141	SCREW,CAP,SCH	4				
19❖†★	---	PLUG,INTEGRATOR MANIFOLD	1				
20*❖†★	110966	PACKING,O-RING	2				
21❖†#✓★	110135	PACKING,O-RING, PTFE	2				
23◆★	123598	ADAPTER,1/2 JIC X 1/4 NPT	2				
24◆★	---	TUBE,LOOP,STATIC MIXER,JIC37	1				
25◆★	125781	FITTING,UNION,08 JIC X 08 JIC,SST	1				
26◆★	---	TUBE,STRAIGHT,STAT MIXER, JIC37	1				
27◆★	118822	MIXER,STATIC, SS	2				
28	---	SPACER, PUMP, MIX TUBE	1				
29	118830	CLAMP, BODY, INTEGRATOR TUBE	1				
30	129531	SCREW, CAP HEX HD	2				
31	---	BOLT,MANIFOLD	1				
32*❖†★	104319	PACKING,O-RING	2				
33	---	PIN,DOWEL	1				
34	---	LUBRICANT,GREASE	1				
35	---	SEALANT,PIPE,SST	1				

\* Parts included in Mix Cleaning Repair Kit, 2008501.

◆ Parts included in J-Pipe Repair Kit, 2008502.

❖ Parts included in Mix Manifold Rebuild Kit, 2008503.

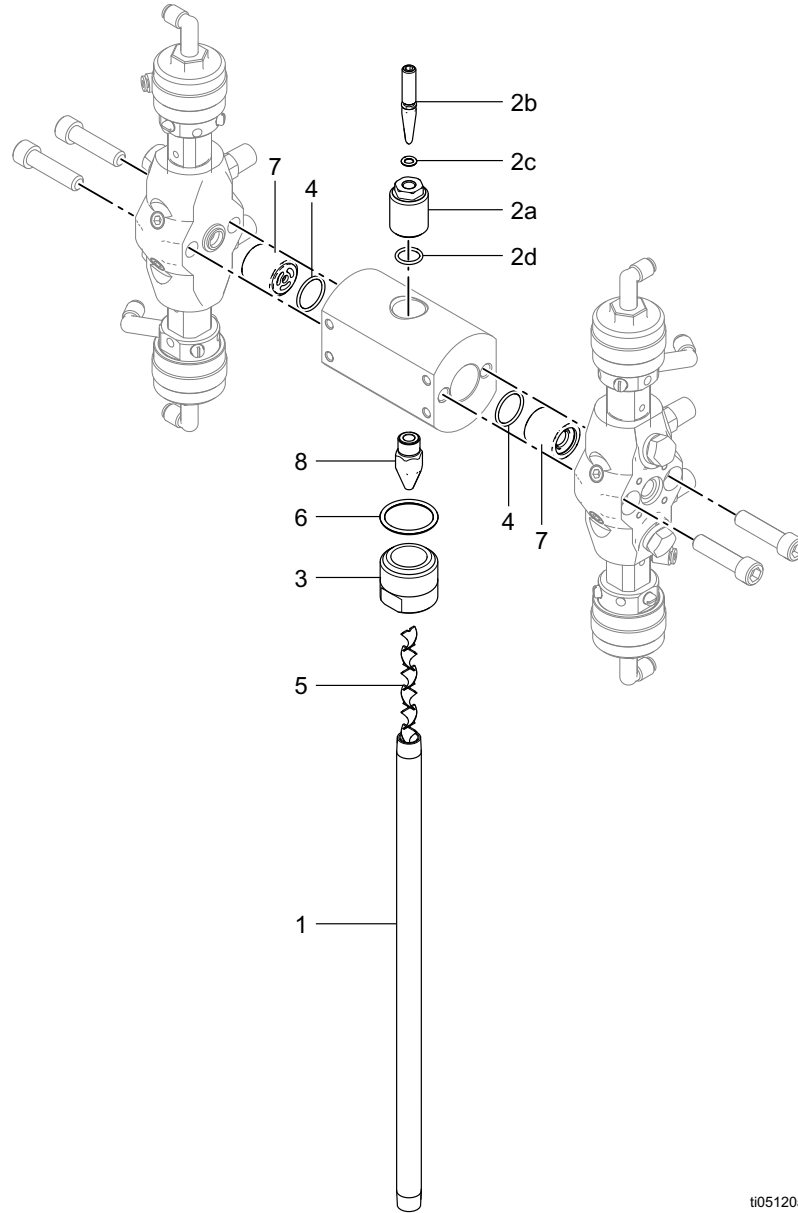
† Parts included in Acid Mix Manifold Rebuild Kit, 2008504.

‡ Parts included in Dose and Purge Valve Repair Kit, 2008505.

✓ Parts included in Acid Dose and Purge Valve Repair Kit, 2008506.

★ Parts included in Cured Mix Manifold Repair Kit, 2008507.

# 2013035, Dynamic Dosing Kit

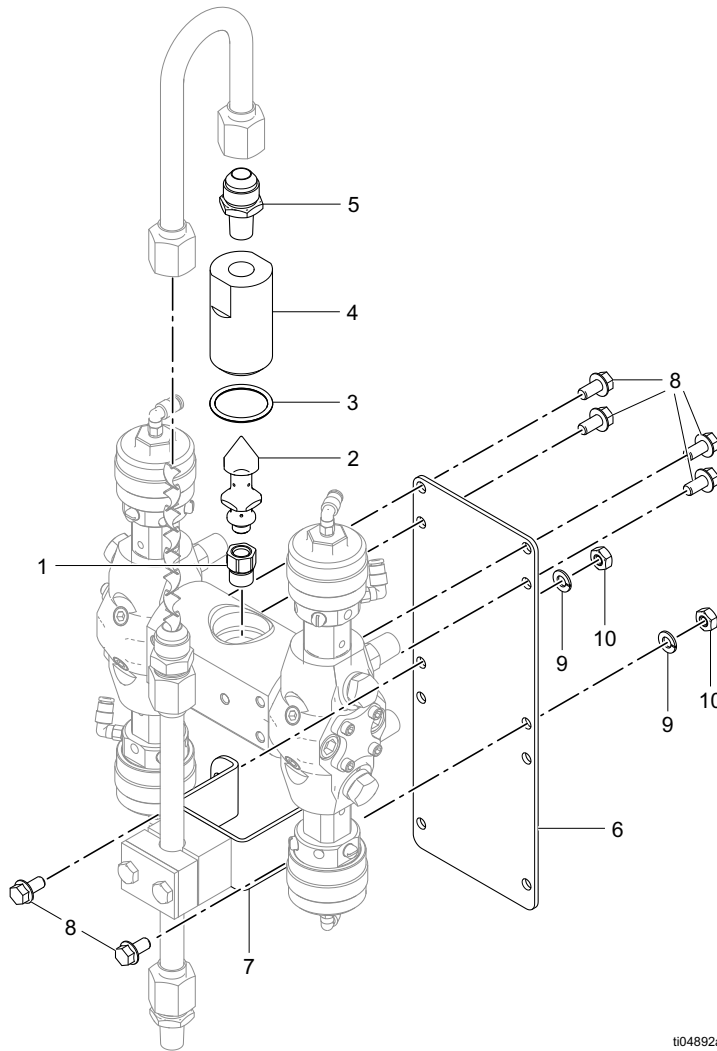


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FIG. 4

Ref.	Part	Description	Qty	Ref.	Part	Description	Qty
1	18D594	TUBE, STRAIGHT, STAT MIXER, NPT	1	4	110135	PACKING, O-RING, PTFE	4
2a	2011370	KIT, B SIDE RESTRICTOR	1	5	118822	MIXER, STATIC, SS	2
2b		PLUG, RESTRICTOR, INTEGRATOR	1	6	110966	PACKING, O-RING, ON STD-ORINGS	4
2c	104319	PACKING, O-RING	1	7		VALVE, CHECK	2
2d		PACKING, O-RING, HEAVY DUTY	1	8		SEAT, VALVE, RESTRICTOR, MIXER	1
3	18D597	CAP, STATIC MIXER, INJECTION	1				

## 2013034, 10cc Kit

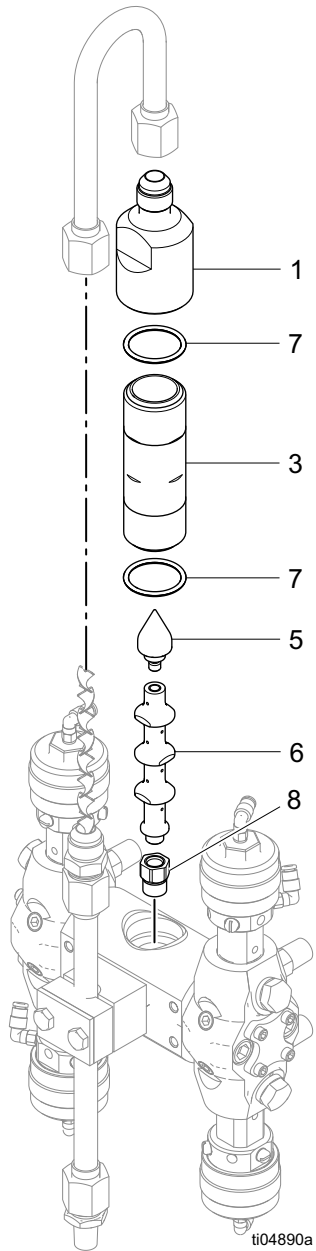


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FIG. 5

Ref.	Part	Description	Qty
1	2013034	KIT,INTEGRATOR,10CC	1
2		MIXER,INTEGRATOR, 10CC	1
3	110966	PACKING,O-RING	2
4		HOUSING, 10CC	1
5		CAP,INTEGRATOR, 10CC	1
6	113161	SCREW,FLANGE,HEX HD	1
7		BRACKET,DROP, 100CC INTEGRATOR	1
8	100015	NUT,HEX MSCR	6
9	100016	WASHER,LOCK	2
10	113161	SCREW,FLANGE,HEX HD	2

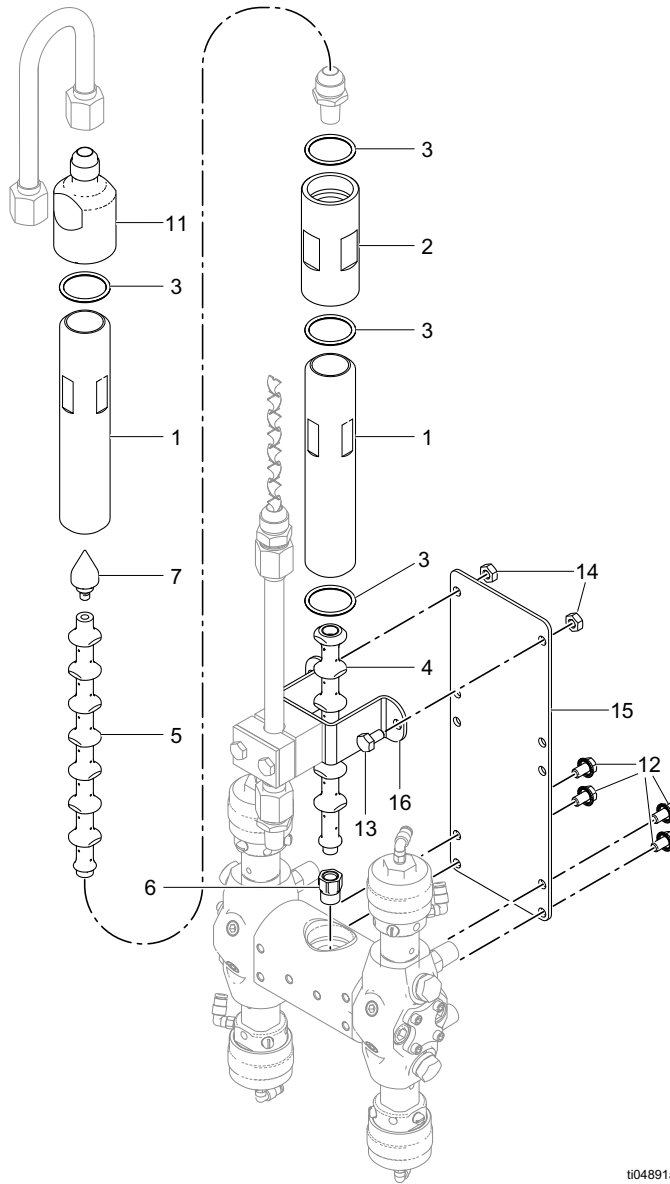
# 2012574, 25cc Kit



Ref.	Part	Description	Qty
1		CAP, HOUSING	1
3		HOUSING,INTEGRATOR, 25CC	1
5	15U734	CAP, MIX	1
6	15T710	MIXER, INTEGRATOR, 25cc	1
7		PACKING,O-RING	2
8	18D394	ADAPTER,INTEGRATOR,MANIF OLD,FTR	1

**FIG. 6**

## 2012584, 100cc Kit



ti04891a

FIG. 7

Ref.	Part	Description	Qty	Ref.	Part	Description	Qty
1		HOUSING,INTEGRATOR, 50CC	1	12	119865	SCREW,MACH,HEX SERRATED	4
2		COUPLER,HOUSING,100CC	1	13	100333	SCREW,CAP,HEX HD	1
3	110966	PACKING,O-RING	4	14	100333	SCREW,CAP,HEX HD	2
4		TUBE,LOWER,100CC	1	15	100015	NUT,HEX MSCR	1
5		TUBE,UPPER,100CC	1	16		BRACKET,DROP, 100CC	1
6	18D394	ADAPTER,INTEGRATOR,MANIF OLD,FTR	1			INTEGRATOR	
7	15U734	CAP,MIX,INTEGRATOR	1				
11		CAP,INTEGRATOR	1				

# Technical Specifications

<b>Fluid Mix Manifold</b>		
	<b>US</b>	<b>Metric</b>
<b>Maximum fluid working pressure</b>		
25U507, 25U508	4000 psi	28.0 MPa, 280 bar
<b>Inlet/Outlet Sizes</b>		
Dispense valve fluid inlet size	1/4 in. npt(f)/ 1/4 in. npt(m) (IniFlex FXMM)	
Dispense valve air inlet size	5/32 in. (4 mm) OD tube	
<b>Materials of Construction</b>		
Wetted materials on all models	303 SST, 316 SST, 17-4 SST, Tungsten Carbide, PTFE, PEEK, Dispense Valves: see manual 312782	
<b>Weight</b>		
25U507	18.3 lb	8.3 kg
25U508	20.4 lb	9.3 kg
<b>Notes</b>		
All trademarks or registered trademarks are the property of their respective owners.		

## California Proposition 65

CALIFORNIA RESIDENTS

 **WARNING:** Cancer and reproductive harm – [www.P65warnings.ca.gov](http://www.P65warnings.ca.gov).

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For patent information, see [www.graco.com/patents](http://www.graco.com/patents).

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**Toll Free Phone Number:** 1-800-328-0211

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Original instructions. This manual contains English. MM 3B0236

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Revision C, December 2025