



INSTRUCTIONS

This manual contains important warnings and information.
READ AND KEEP FOR REFERENCE.

First choice when quality counts.™

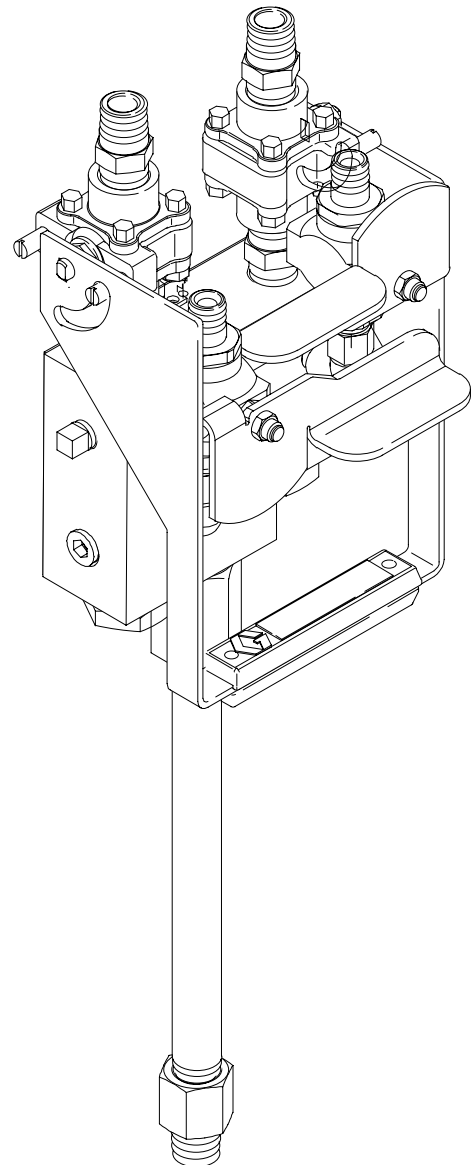
PLURAL COMPONENT

Mix Manifold

5000 psi (34 MPa, 345 bar) Maximum Working Pressure

Part No. 240225, Series A

High Pressure Mixer; 1/2 npt(m) fluid outlet



8396A

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Symbols

Warning Symbol



This symbol alerts you to the possibility of serious injury or death if you do not follow the instructions.

Caution Symbol



This symbol alerts you to the possibility of damage to or destruction of equipment if you do not follow the instructions.

WARNING



INSTRUCTIONS

EQUIPMENT MISUSE HAZARD

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

- This equipment is for professional use only.
- Read all instruction manuals, tags, and labels before operating the equipment.
- Use the equipment only for its intended purpose. If you are uncertain about usage, call your Graco distributor.
- Do not alter or modify this equipment. Use only genuine Graco parts and accessories.
- Check equipment daily. Repair or replace worn or damaged parts immediately.
- Do not exceed the maximum working pressure of the lowest rated system component. Refer to the **Technical Data** on page 7 for the maximum working pressure of this equipment.
- Use fluids and solvents which are compatible with the equipment wetted parts. Refer to the **Technical Data** section of all equipment manuals. Read the fluid and solvent manufacturer's warnings.
- Route hoses away from traffic areas, sharp edges, moving parts, and hot surfaces. Do not expose Graco hoses to temperatures above 180°F (82°C) or below -40°F (-40°C).
- Wear hearing protection when operating this equipment.
- Do not lift pressurized equipment.
- Comply with all applicable local, state, and national fire, electrical, and safety regulations.

WARNING



INJECTION HAZARD

Spray from the gun, hose leaks, or ruptured components can inject fluid into your body and cause extremely serious injury, including the need for amputation. Fluid splashed in the eyes or on the skin can also cause serious injury.



- Fluid injected into the skin might look like just a cut, but it is a serious injury. **Get immediate medical attention.**
- Follow the **Pressure Relief Procedure** in the separate proportioner manual whenever you: are instructed to relieve pressure; clean, check, or service the equipment.
- Tighten all fluid connections before operating the equipment.
- Check the hoses, tubes, and couplings daily. Replace worn, damaged, or loose parts immediately. Permanently coupled hoses cannot be repaired; replace the entire hose.
- Use only Graco approved hoses. Do not remove any spring guard that is used to help protect the hose from rupture caused by kinks or bends near the couplings.



TOXIC FLUID HAZARD

Hazardous fluid or toxic fumes can cause serious injury or death if splashed in the eyes or on the skin, inhaled, or swallowed.

- Know the specific hazards of the fluid you are using.
- Store hazardous fluid in an approved container. Dispose of hazardous fluid according to all local, state and national guidelines.
- Always wear protective eyewear, gloves, clothing and respirator as recommended by the fluid and solvent manufacturer.
- Graco does not manufacture or supply any of the reactive chemical components that may be used in this equipment and is not responsible for their effects. Graco assumes no responsibility for loss, damage, expense, or claims for personal injury or property damage, direct or consequential, arising from the use of such chemical components.

Service

⚠ CAUTION

Be sure to label all fluid path parts “component A” or “component B” when disassembling them. Doing so prevents interchanging A and B parts during reassembly, which will contaminate the materials and the fluid path through the equipment.

Color-coded chemically resistant tape may be used to label the parts. Use blue for component A, green for component B, white for solvent, and red for mixed material.

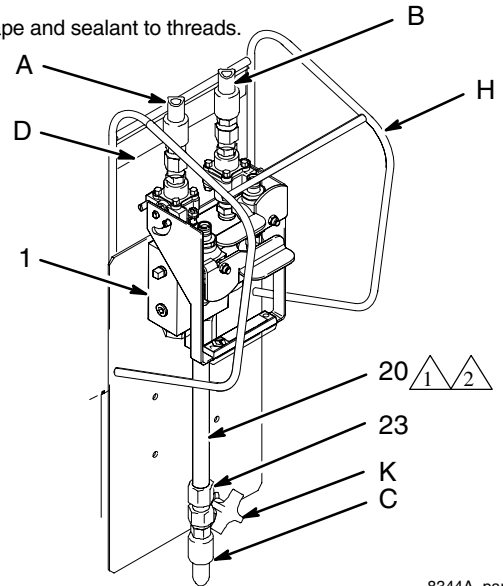
1. Flush the mix manifold, using the solvent pump, as frequently during the day as necessary to avoid exceeding the work-life limit of the material being pumped. Refer to the separate proportioner manual for further flushing instructions.
2. Follow the **Pressure Relief Procedure** in the separate proportioner manual.
3. See the Parts drawing, page 6. Visually inspect the static mixer (20) weekly. Remove the hose (C) from the static mixer. Unscrew the static mixer from the manifold (1). Push the mixer element out of the static mixer by inserting a wooden dowel at the adapter (23) end. Clean all parts with a compatible solvent, and reassemble.
4. Label the component A and B hoses and remove them from the inlet nipples (29).
5. Loosen the knob (K) and lift the mix manifold panel off the hanger (D), using the handles (H).
6. Move the handle (14) to the down (open) position. Remove the outer handle nuts of the ball valves (13); be careful not to turn the inner nuts. Set the nuts aside for reassembly. Take the handle (14) off the valves.
7. Label the ball valves (13) and remove them from the manifold (1). Do not remove the inlet nipple (29) and outlet nipple (12) from the ball valves unless necessary.
8. Label the solvent ball valves (19) and swivel fittings (18), and remove them from the manifold (1). Refer to manual 306861 to service the ball valves.
9. Label the check valves (4) and unscrew them from the manifold (1). Be careful not to let the ball (6) and other parts fall out of the manifold.
10. Remove the seats (10) using a 10 mm allen wrench. Inspect the check valve (4), ball (6), spring (5), seat (10), and o-rings (9, 11) for damage. Replace if necessary.
11. Clean all parts thoroughly in a compatible solvent. Use a soft bristle brush to clean the manifold (1) passageways.



Arrow must point down.



Apply tape and sealant to threads.



8344A-part

Fig. 1

Service

12. Reassemble the component A and B check valves (4, 9, 5, 6, 10, 11). Replace and lubricate the o-rings (9, 11). Install the check valves in the manifold (1) and torque to 33–37 ft-lb (45–50 N•m).
13. Apply thread sealant to the male threads of the fittings (18) and install them in the manifold (1). Install the solvent valves (19) with the arrows pointing down toward the manifold outlet.
14. Apply thread sealant and install the component A and B outlet nipples (12), ball valves (13), and inlet nipples (29).
15. Install the handle (14) on the ball valves (13) so the handle is in the down (open) position. Secure with the nuts; be careful not to turn the inner nuts.
16. Lift the mix manifold panel onto the hanger (D), using the handles (H). Tighten the knob (K).
17. Reconnect the component A and B fluid hoses.
18. Install the static mixer (20). The arrow on the static mixer must point down. Apply tape and sealant to the threads of the static mixer (20).

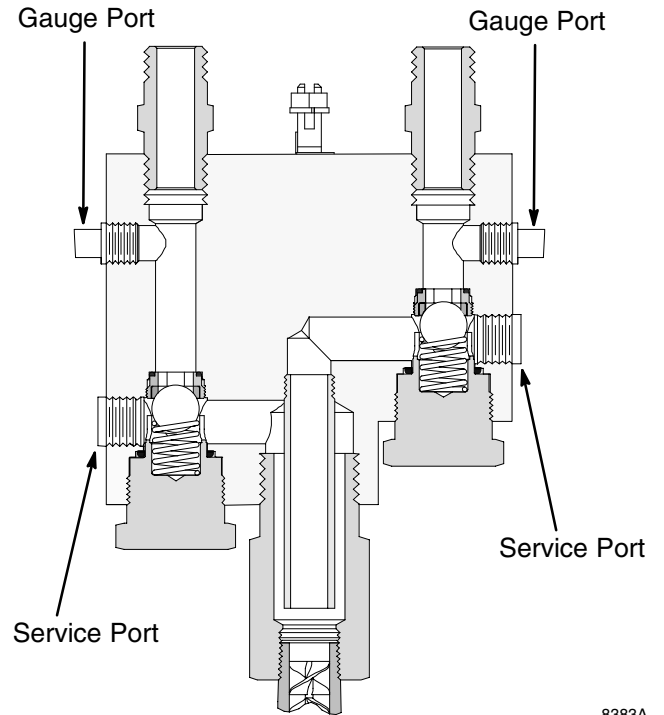


Fig. 2

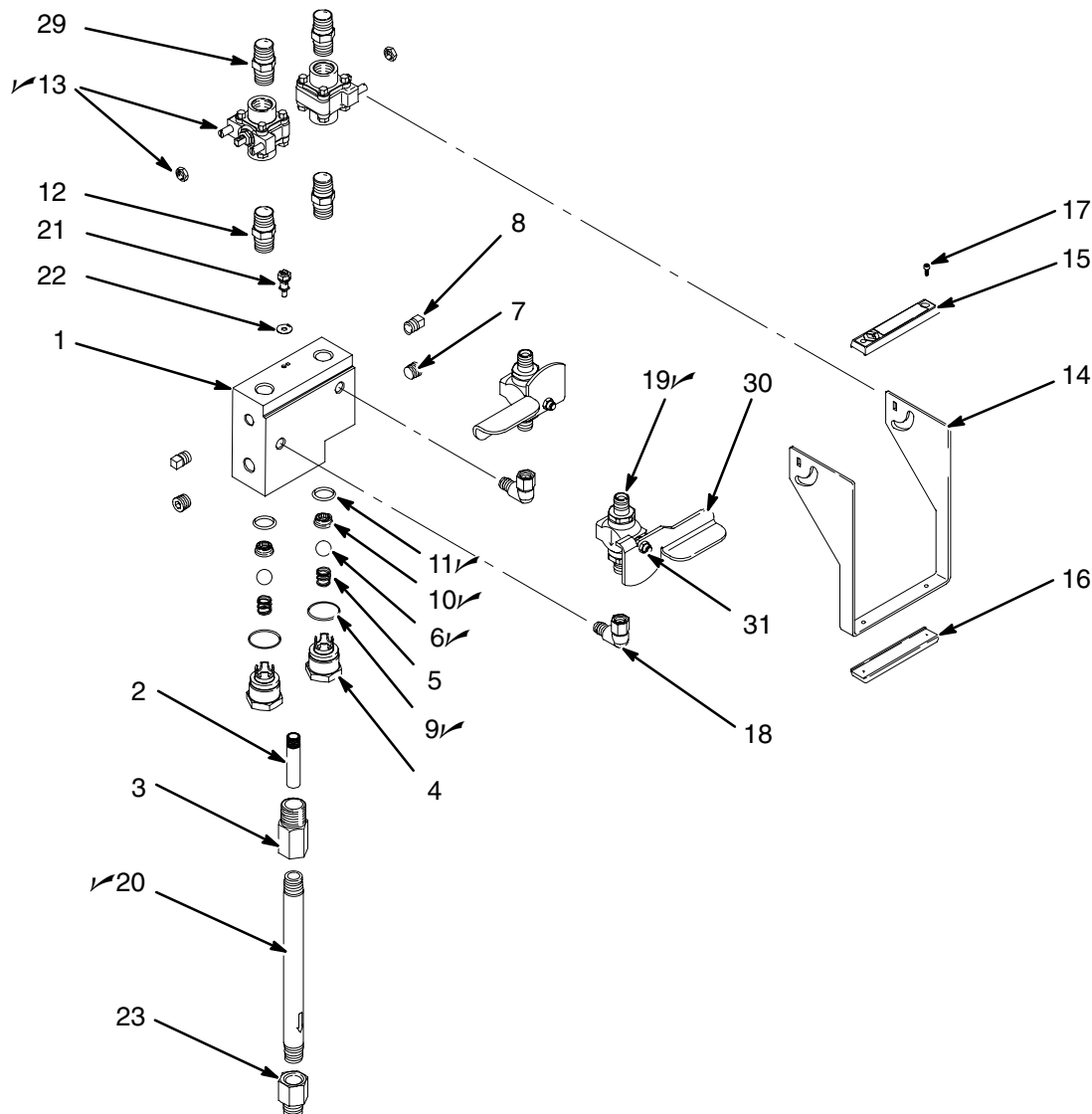
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Parts

Ref No.	Part No.	Description	Qty.	Ref No.	Part No.	Description	Qty.
1	192976	MANIFOLD, high pressure	1	21	104029	LUG, grounding	1
2	192977	PIPE, center; 3/8 npt(m) one end	1	22	104582	WASHER, tab	1
3	192978	PIPE, outlet; 1" npt(m) x 1/2 npt(f)	1	23	114499	ADAPTER; 1/2 npt (m x f)	1
4	192979	CHECK VALVE	2	29	114572	NIPPLE; 1/2 npt x 1/2 npsm	2
5	114353	SPRING, compression	2	30	193151	HANDLE, valve	2
6✓	108818	BALL; carbide; 0.625 in. (10 mm)	2	31	102310	NUT, hex; nylon cap; no. 10-32	2
7	101748	PLUG, pipe; 3/8 npt; hex socket	2	✓ Keep these spare parts on hand to reduce down time.			
8	111697	PLUG, pipe; 1/4 npt; square head	2	* These parts are included in Repair Kit 198672, which may be purchased separately.			
9✓	112973	O-RING; PTFE	2				
10✓	240452	SEAT	2				
11✓	102982	O-RING; PTFE	2				
12	114373	NIPPLE; 1/2 npt	2				
13*✓	114354	BALL VALVE; 1/2 npt (fbe)	2				
14	193148	HANDLE	1				
15	167124	GRIP, hand	1				
16	167125	GRIP, hand	1				
17	102410	SCREW, cap; socket head	2				
18	114446	UNION, swivel, 90; 1/4 npsm(f) x 1/4 npt(m)	2				
19✓	240411	BALL VALVE; 1/4 npt (mbe)	2				
20✓	114372	STATIC MIXER; 1/2 npt (mbe)	1				

Repair Kit 198672

Item No.	Description	Quantity
1	SEAT, ball	2
2	BEARING, thrust	1
3	WASHER, belleville	2
4	SEAL, body	2
5	SEAL, stem	1



Technical Data

Category	Data
Maximum working pressure	5000 psi (34 MPa, 345 bar)
Fluid port size	1/2 npsm(m)
Solvent port size	1/4 npt(m)
Fluid outlet size	1/2 npt(m)
Wetted parts	17-4 PH, 304 and 316 stainless steels; tungsten carbide, PEEK, Delrin [®] , PTFE

Delrin[®] is a registered trademark of the Du Pont Company.

Graco Standard Warranty

Graco warrants all equipment manufactured by Graco and bearing its name to be free from defects in material and workmanship on the date of sale by an authorized Graco distributor to the original purchaser for use. With the exception of any special, extended, or limited warranty published by Graco, Graco will, for a period of twelve months from the date of sale, repair or replace any part of the equipment determined by Graco to be defective. This warranty applies only when the equipment is installed, operated and maintained in accordance with Graco's written recommendations.

This warranty does not cover, and Graco shall not be liable for general wear and tear, or any malfunction, damage or wear caused by faulty installation, misapplication, abrasion, corrosion, inadequate or improper maintenance, negligence, accident, tampering, or substitution of non-Graco component parts. Nor shall Graco be liable for malfunction, damage or wear caused by the incompatibility of Graco equipment with structures, accessories, equipment or materials not supplied by Graco, or the improper design, manufacture, installation, operation or maintenance of structures, accessories, equipment or materials not supplied by Graco.

This warranty is conditioned upon the prepaid return of the equipment claimed to be defective to an authorized Graco distributor for verification of the claimed defect. If the claimed defect is verified, Graco will repair or replace free of charge any defective parts. The equipment will be returned to the original purchaser transportation prepaid. If inspection of the equipment does not disclose any defect in material or workmanship, repairs will be made at a reasonable charge, which charges may include the costs of parts, labor, and transportation.

THIS WARRANTY IS EXCLUSIVE, AND IS IN LIEU OF ANY OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING BUT NOT LIMITED TO WARRANTY OF MERCHANTABILITY OR WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE.

Graco's sole obligation and buyer's sole remedy for any breach of warranty shall be as set forth above. The buyer agrees that no other remedy (including, but not limited to, incidental or consequential damages for lost profits, lost sales, injury to person or property, or any other incidental or consequential loss) shall be available. Any action for breach of warranty must be brought within two (2) years of the date of sale.

Graco makes no warranty, and disclaims all implied warranties of merchantability and fitness for a particular purpose in connection with accessories, equipment, materials or components sold but not manufactured by Graco. These items sold, but not manufactured by Graco (such as electric motors, switches, hose, etc.), are subject to the warranty, if any, of their manufacturer. Graco will provide purchaser with reasonable assistance in making any claim for breach of these warranties.

In no event will Graco be liable for indirect, incidental, special or consequential damages resulting from Graco supplying equipment hereunder, or the furnishing, performance, or use of any products or other goods sold hereto, whether due to a breach of contract, breach of warranty, the negligence of Graco, or otherwise.

FOR GRACO CANADA CUSTOMERS

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Graco Phone Numbers

TO PLACE AN ORDER, contact your Graco distributor, or call one of the following numbers to identify the distributor closest to you:

1-800-367-4023 Toll Free

612-623-6921

612-378-3505 Fax

*All written and visual data contained in this document reflects the latest product information available at the time of publication.
Graco reserves the right to make changes at any time without notice.*

Sales Offices: Minneapolis, Los Angeles
International Offices: Belgium, Korea, Hong Kong, Japan

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PRINTED IN USA 308858 May 1998, Revised July 2001