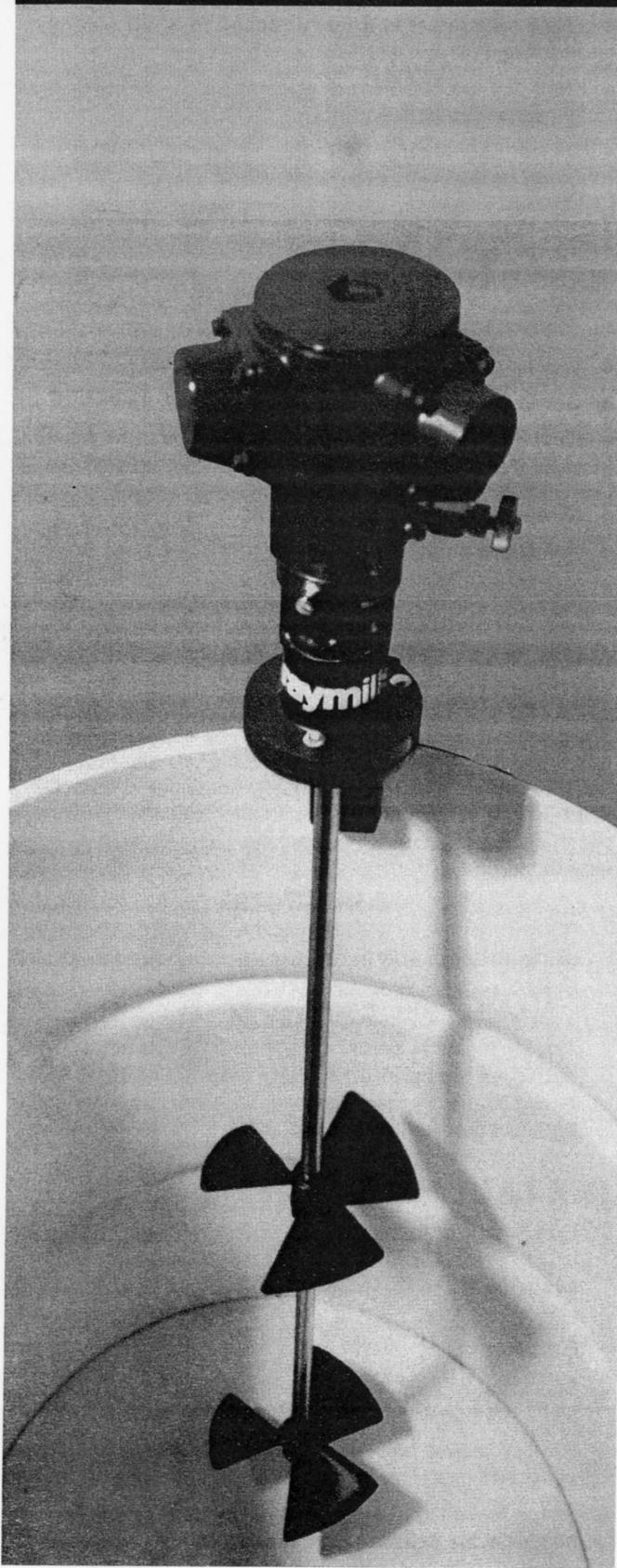


# Graymills



## **MX55-GAMP, MIX55-PAM Air Powered Drum Mixer**

**Operations and Maintenance  
Instructions**

## ⚠️ WARNINGS/CAUTIONS

Do not install or operate until you have read all warnings and instructions and understand the operation of this equipment. Keep this manual handy for reference/training.

### SAFETY

You will find various types of safety information on the following pages and on the labels attached to Graymills equipment. The following Safety Statements explain their meaning:

⚠️ The Safety Alert Symbol means ATTENTION! BECOME ALERT! YOUR SAFETY IS INVOLVED!

⚠️ **DANGER** The **DANGER** Symbol means that failure to follow this safety statement **will** result in serious personal injury or death.

⚠️ **WARNING** The **WARNING** Symbol means that failure to follow this safety statement **might** result in serious personal injury or death.

⚠️ **CAUTION** The **CAUTION** Symbol means that failure to follow this safety statement **might** result in personal injury or property damage.

**NOTE** The **NOTE** Symbol means failure to follow these instructions could cause damage to the equipment or cause it to operate improperly.

### ⚠️ **WARNING**

Do not install or operate until you have read all warnings and instructions and understand the operation of this equipment. Keep this manual handy for reference/training.

### ⚠️ **DANGER**

- When mixing flammable or combustible materials, a Static Protection Kit must be used. (order Graymills Part No. 790-100835).

### ⚠️ **WARNING**

- When using mixer, be aware of what liquid is/has been mixed. If liquid is potentially harmful, take appropriate precautions, including personal protective clothing.

### ⚠️ **CAUTIONS**

- Read and follow all safety instructions supplied with the fluids/inks you will be mixing.
- This mixer has rotating parts. Use caution.
- Air motor must have filtered and lubricated air. For proper operation, maintain the correct air pressure of 9.2 CFM.
- Be sure all fittings and connections are properly tightened before use.
- Remove air supply before doing any service on mixer or motor.
- Wear eye protection and appropriate safety gear when using mixer.
- Do not operate mixer or allow others to operate mixer until the instructions and warnings have been read and are understood by all people involved.**

Never work with equipment you feel may be unsafe. Contact your Supervisor immediately.

## OPERATION AND SAFETY GUIDELINES

### ⚠️ **CAUTION**

- Place mixer in liquid before starting.
- Do not attach air line until mixer is in fluid and you are ready to begin mixing.
- Make sure mixer is firmly attached to drum before starting.
- Operator should wear eye protection and appropriate personal protective clothing.
- Do not use mixer with liquids containing solids that could damage propellers or motor.

## DESCRIPTION

### MX55-GAMP features:

- Tri-piston motor provides high mixing torque at low RPM
- Low air consumption, 9.2 CFM
- Reversible
- Dual 6" aluminum propellers
- 36" long stainless steel shaft
- Mixes viscosities up to 10,000 cps
- Adjustable mounting clamp
- Lightweight, only 17 pounds

## AIR MOTOR GENERAL INFORMATION

The air motor is designed to be driven by compressed air and under NO circumstances to be driven by any other gases. The air motor must not be driven by fluids, particles, solids or any substance mixed with air, particularly combustible or flammable substances likely to cause explosions.

### ⚠️ **WARNING**

Do not run mixer with flammable or explosive gases or operate the unit in an atmosphere containing them.

### ⚠️ **CAUTION**

The air motor is designed for air only. Do not allow corrosive gases or particulate material to enter the motor. Water vapor, oil-based contaminants, or other liquids must be filtered out.

## INSTALLATION (see Fig. 1)

- Remove mixer from carton. The carton should contain the air motor mounted on a shaft, 1 mounting plate, 1 mounting clamp, 2 propellers, 4 bolts and 2 set screws.
- Mixer is assembled except for propellers and mounting hardware.
- Slide Mounting Plate onto shaft and attach to bottom of mixer with the 3 smaller bolts.
- Slide propellers onto shaft, insert set screws and tighten at desired positions.
- Attach Mounting Clamp to 55-gallon metal drum with handle to the outside.

6. Use large carriage bolt to attach Mounting Plate on mixer to Mounting Clamp.
7. Install a moisture trap and filter in the air line ahead of motor (Graymills Part No. FRL-2). Use a 1/4" air line for efficiency of output and control of speed.
8. Attach air supply to mixer.

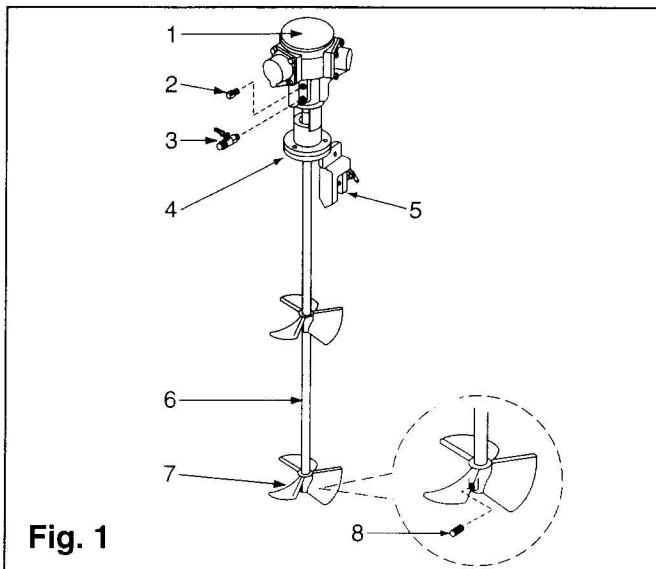
## STARTING

1. Insure that mixer has been properly installed.
2. Turn on air supply.
3. Rotate air inlet ball valve slowly until desired speed is obtained.

NOTE: The starting torque is less than the running torque. The speed and torque can be regulated by using a pressure regulator or a simple shut-off valve to obtain desired power and conserve air.

## SHUTDOWN AND STORAGE PROCEDURE

1. Turn off air supply.
2. Remove mixer with air motor from air supply.
3. Clean shaft and propellers with clean solvent or water.



**PARTS DESCRIPTION** (Fig. 1)

| Ref | Description                 |
|-----|-----------------------------|
| 1   | Air motor                   |
| 2   | Air outlet muffler          |
| 3   | Air inlet                   |
| 4   | Mounting plate              |
| 5   | Mounting clamp -- 785-91956 |
| 6   | Shaft                       |
| 7   | Propeller -- 785-91163-31   |
| 8   | Set screw for propeller     |

Air motor rebuild kit # 785-90760  
 Spacer # 785-91719  
 Connecting Rod #785-91720

## STATIC PROTECTION KIT (OPTIONAL)

### ▲DANGER

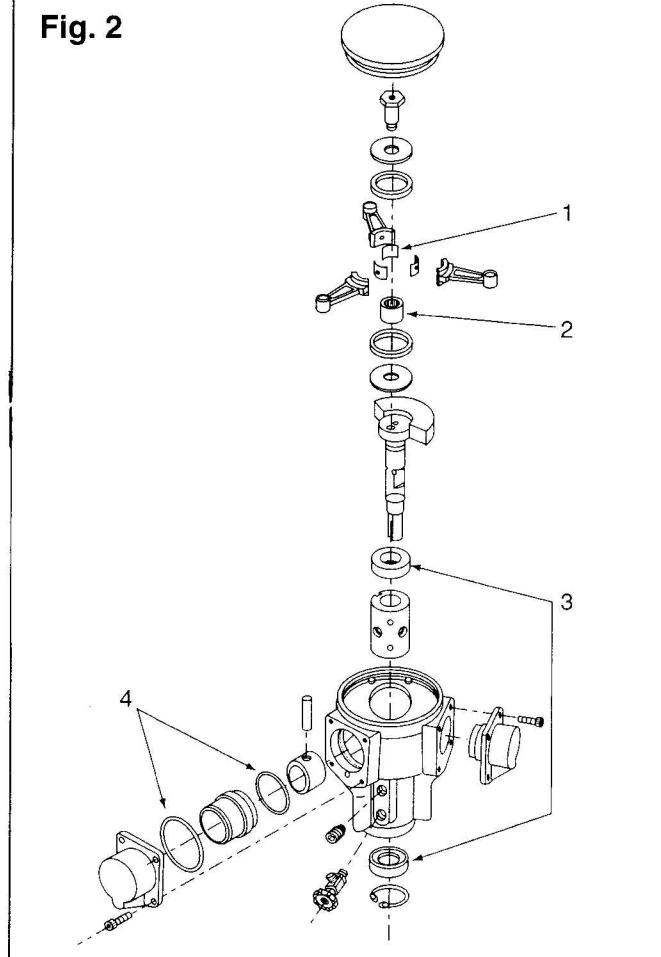
Mixing flammable liquids can create static electricity which can cause an explosion and/or fire resulting in injury or death. All flammable/combustible materials must be in metal containers and must be grounded.

## STATIC PROTECTION KIT 790-100835

### Contents:

| Qty. | Description                            |
|------|--|
| 1    | 4' Grounded Hose with special end      |
| 1    | Stainless steel hose clamp             |
| 1    | 6' 10" Ground Wire Assembly with Clamp |
| 2    | #10-32 plated nut                      |
| 1    | #10 lock washer                        |
| 1    | 1/4 - 20x5/8" round head machine screw |
| 1    | 1/4-20 plated jamb nut                 |
| 1    | #8-32 x 1/4" brass screw               |
| 1    | #8-32 brass lock washer                |

**Fig. 2**



**SERVICE KIT** (Fig. 2)

### PART NUMBER 785-90760

| Ref | Description    | Quantity |
|-----|----------------|----------|
| 1   | Gasket         | 3        |
| 2   | Needle Bearing | 1        |
| 3   | Bearings       | 2        |
| 4   | O-Rings        | 3        |

## **WARRANTY**

**Graymills Corporation** warrants that the equipment manufactured and delivered, when properly installed and maintained, shall be free from defects in workmanship and will function as quoted in the published specification. **Graymills** does not warrant process performance, nor assume any liability for equipment selection, adaptation, or installation.

Warranty does not apply to damages or defects caused by shipping, operator carelessness, misuse, improper application or installation, abnormal use, use of add-on parts or equipment which damages or impairs the proper function of the unit, and modifications made to the unit. Warranty does not apply to expendable parts needing replacement periodically due to normal wear and tear.

A new Warranty period shall not be established for repaired or replaced materials or products. Such items shall remain under Warranty for only the remainder of the Warranty period of the original material or product.

THE FOREGOING WARRANTIES ARE IN LIEU OF ALL OTHER WARRANTIES, WHETHER ORAL, WRITTEN, EXPRESSED, IMPLIED OR STATUTORY. **GRAYMILLS CORPORATION** MAKES NO OTHER WARRANTY OF ANY KIND, EXPRESS OR IMPLIED. ALL IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE WHICH EXCEED THE AFORESTATED

OBLIGATION ARE HEREBY DISCLAIMED BY **GRAYMILLS CORPORATION** AND EXCLUDED FROM THIS SALE.

**Graymills** warranty obligations and Buyer remedies (except to title), are solely and exclusively stated herein. In no case will **Graymills** be liable for consequential damages, loss of production, or any other loss incurred due to interruption of service.

**Graymills'** obligation under this Warranty shall be limited to:

- (a) Repairing or replacing (at **Graymills** sole discretion) any non-conforming or defective component within one year from the date of shipment from **Graymills**.
- (b) Repairing or replacing (at **Graymills** sole discretion), components supplied by, but not manufactured by **Graymills**, to the extent of the warranty given by the original manufacturer.

Buyer must give **Graymills** prompt notice of any defect or failure.

If you believe you have a Warranty claim, contact **Graymills** at (773)248-6825. Any returned material must have an RMA number on the outside of the package and shipped prepaid or shipment will be refused. **Graymills** will promptly examine the material and determine if it is defective and within the Warranty period.

# **Graymills**

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