Fragola 350012

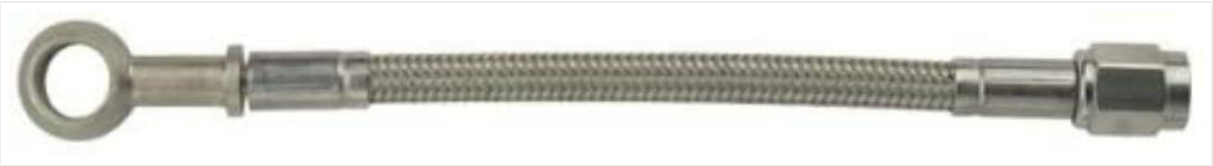
Fragola 350012 Brake Hose Assembly User Manual

Model: **350012** | Brand: **Fragola**

Introduction

This manual provides essential information for the proper installation, operation, and maintenance of your Fragola 350012 Brake Hose Assembly. Designed for high-performance applications, this brake hose assembly meets D.O.T. specifications for flexible brake lines, offering a reliable replacement for worn-out rubber brake lines. Please read this manual thoroughly before installation and retain it for future reference.

Product Overview and Features



An image showing the Fragola 350012 Brake Hose Assembly, featuring a braided stainless steel hose with a banjo fitting on one end and a threaded fitting on the other. This assembly is 12 inches long.

The Fragola 350012 Brake Hose Assembly is engineered for durability and performance. Key features include:

- **Direct Replacement:** Perfect replacement for worn-out rubber brake lines, ensuring consistent braking performance.
- **Versatile Configurations:** Assemblies are available in all popular configurations of -3 and -4 hose ends, providing compatibility for various setups.
- **Pressure Tested:** Each line is rigorously pressure tested to its rated working pressure before shipping, guaranteeing reliability and safety.
- **Compact Dimensions:** Item package dimensions are approximately 13.0" L x 1.5" W x 4.0" H, indicating a compact and manageable size for installation.
- **D.O.T. Compliant:** Meets D.O.T. Specifications for flexible brake lines, ensuring legal and safe use

on public roads when specified.

Specifications

Attribute	Detail
Brand	Fragola
Model	350012
Material	Rubber (inner hose), Braided Stainless Steel (outer layer)
Color	Black (hose), Metallic (fittings)
Item Weight	0.1 Pounds (approx. 1.6 ounces)
Product Dimensions	12 x 3 x 0.5 inches (approximate package dimensions)
UPC	822320010251
Manufacturer Part Number	350012
Hose Type	#3 Str X 7/16 Bjo
Length	12 inches

Installation Guidelines

Proper installation is critical for the safe and effective operation of your braking system. It is highly recommended that installation be performed by a qualified automotive technician.

1. **Safety First:** Ensure the vehicle is securely supported on jack stands or a lift. Disconnect the battery if working near electrical components. Wear appropriate personal protective equipment (PPE), including safety glasses and gloves.
2. **System Depressurization:** Before disconnecting any brake lines, ensure the braking system is depressurized to prevent fluid spray.
3. **Old Hose Removal:** Carefully disconnect the old brake hose from both the caliper/wheel cylinder and the hard line. Be prepared for brake fluid to leak. Use a suitable container to catch any fluid.
4. **New Hose Installation:**
    - Connect the new Fragola brake hose assembly, ensuring the correct fittings are used for each end (banjo fitting to caliper/wheel cylinder, threaded fitting to hard line).
    - Tighten all connections to the manufacturer's specified torque values. Overtightening can damage fittings, while undertightening can lead to leaks.
    - Ensure the hose is routed correctly, avoiding kinks, sharp bends, or contact with moving parts (e.g., suspension components, tires) or hot surfaces (e.g., exhaust). There should be sufficient slack for full suspension travel and steering lock-to-lock without stretching or rubbing.
5. **Brake System Bleeding:** After installation, the brake system must be thoroughly bled to remove all air. Air in the brake lines can lead to a spongy pedal and reduced braking effectiveness. Follow the vehicle manufacturer's recommended bleeding procedure.
6. **Leak Check:** After bleeding, visually inspect all connections for leaks. Apply firm pressure to the

brake pedal and hold it for several seconds while checking for any signs of fluid leakage.

7. **Test Drive:** Perform a cautious test drive in a safe area to confirm proper brake operation before returning the vehicle to regular use.

Operation

The Fragola 350012 Brake Hose Assembly functions as a critical component within your vehicle's hydraulic braking system. It transmits hydraulic pressure from the hard brake lines to the brake calipers or wheel cylinders, allowing the brake pads or shoes to engage and slow down or stop the vehicle. Once properly installed and bled, the hose operates passively as part of the sealed hydraulic circuit, ensuring consistent and reliable brake pedal feel and stopping power.

Maintenance

Regular inspection of your brake hose assemblies is crucial for safety and longevity. While the Fragola brake hose is designed for durability, external factors can cause wear or damage.

- **Visual Inspection:** Periodically inspect the entire length of the brake hose for any signs of wear, cracks, bulges, abrasions, or leaks. Pay close attention to the areas near the fittings.
- **Routing Check:** Ensure the hose remains properly routed and is not rubbing against any suspension components, tires, or other vehicle parts. Correct any improper routing immediately.
- **Fluid Leaks:** Check for any signs of brake fluid leaks around the hose fittings or along the hose itself. Even minor leaks can compromise braking performance and safety.
- **Corrosion:** Inspect fittings for corrosion, which can weaken the connection or lead to leaks.
- **Fluid Quality:** While not directly related to the hose's physical integrity, maintaining clean and fresh brake fluid as per your vehicle manufacturer's recommendations is vital for overall brake system health.

Any signs of damage or degradation warrant immediate replacement of the brake hose assembly.

Troubleshooting

While the Fragola brake hose is a robust component, issues in the braking system can sometimes be attributed to or affect the hose. Here are common issues and potential causes:

- **Brake Fluid Leakage:**
  - *Cause:* Improperly tightened fittings, damaged hose (cracks, abrasions), faulty banjo bolt washers, or internal hose failure.
  - *Solution:* Inspect all connections for proper torque. Check the hose for visible damage. Replace the hose if damaged. Ensure new crush washers are used with banjo fittings.
- **Spongy Brake Pedal:**
  - *Cause:* Air trapped in the brake lines after installation, or a bulging/expanding brake hose under pressure (indicating internal failure).
  - *Solution:* Thoroughly bleed the brake system. If bleeding does not resolve the issue and the hose appears to expand, replace the hose.
- **Brake Drag or Uneven Braking:**
  - *Cause:* Internal collapse or blockage of the brake hose, preventing fluid return from the caliper.
  - *Solution:* This is a serious issue. The hose must be replaced immediately.

If you experience any of these symptoms, it is critical to have your braking system inspected by a qualified technician immediately.

Safety Information

Working with automotive braking systems involves inherent risks. Adhere to the following safety precautions:

- Always wear appropriate personal protective equipment (PPE), including safety glasses and chemical-resistant gloves, when handling brake fluid.
- Brake fluid is corrosive and can damage paint and other surfaces. Clean up spills immediately.
- Never work under a vehicle supported only by a jack. Always use sturdy jack stands.
- Ensure the vehicle is cool before working on brake components to avoid burns.
- Dispose of old brake fluid and components according to local environmental regulations.
- If you are unsure about any step of the installation or maintenance process, consult a professional automotive technician.
- This product contains chemicals known to the State of California to cause cancer and birth defects or other reproductive harm (Proposition 65 warning). Handle with care and wash hands after use.

Warranty and Support

For information regarding warranty coverage, technical support, or replacement parts for your Fragola 350012 Brake Hose Assembly, please refer to the official Fragola Performance Systems website or contact their customer service directly. Keep your purchase receipt as proof of purchase for any warranty claims. *Note: This manual provides general guidelines. Always refer to your vehicle's specific service manual for detailed procedures and torque specifications.*