

 Aeroquip



TRAINING BULLETIN

JA281

Supersedes Bulletin 2278

# HOW TO

handle  
Teflon  
hose



# How to Handle Teflon Hose

## General:

Aeroquip Teflon\* hose assemblies provide many benefits including excellent temperature resistance and extended fluid compatibility. However, since the tube is not a rubber elastomer, it should always be handled with extra care to

prevent excessive bending, twisting and kinking. Be sure to avoid dragging Teflon hose on concrete surfaces, using it as a climbing handle and bending it severely to fit into cramped storage areas.



**WARNING:**  
Never step  
or stand on  
Teflon hose.

\*Teflon is a DuPont Trademark

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## Caution:

Teflon hose kinks more easily in larger sizes and on very short assemblies. Although Aeroquip Convolute Teflon hose has a much tighter bend radius, it also can be kinked when bent beyond the specified minimum bend radius. Extra care should be exercised in han-

dling and installing all Teflon hose assemblies.

When long lengths of Teflon hose are coiled for storage, a liberal coil diameter must be provided to prevent kinking.



**WARNING:**  
Do not use cramped or otherwise confined storage areas.

# How to handle Teflon Hose

## Tips for Proper Installation



- Attach the hose first to the more inaccessible end of its routing. Finger tighten it only so that the hose is free to turn during installation.
- Attach the other end of the hose in the same manner.
- Should you find that the hose line is not tightened sufficiently, loosen the swivel (female) end before tightening the male end.
- Properly orient the hose along its routing and install the required support clamps.

### WARNING:

Do not use a Teflon hose for a handle when accessories or components are removed from engines or in any other instance.

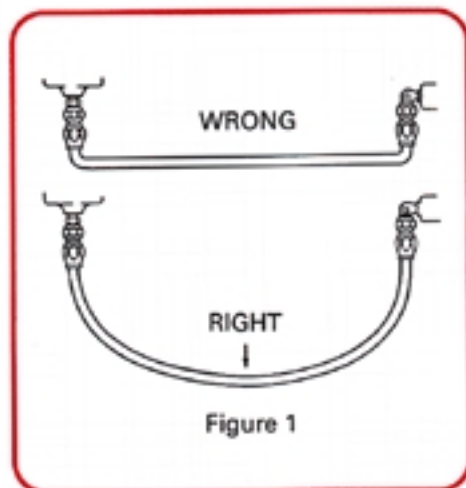


Figure 1

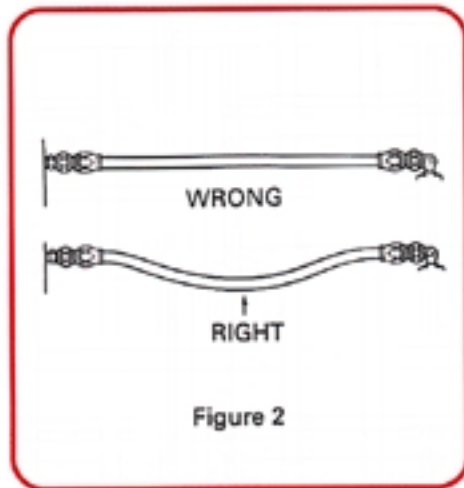
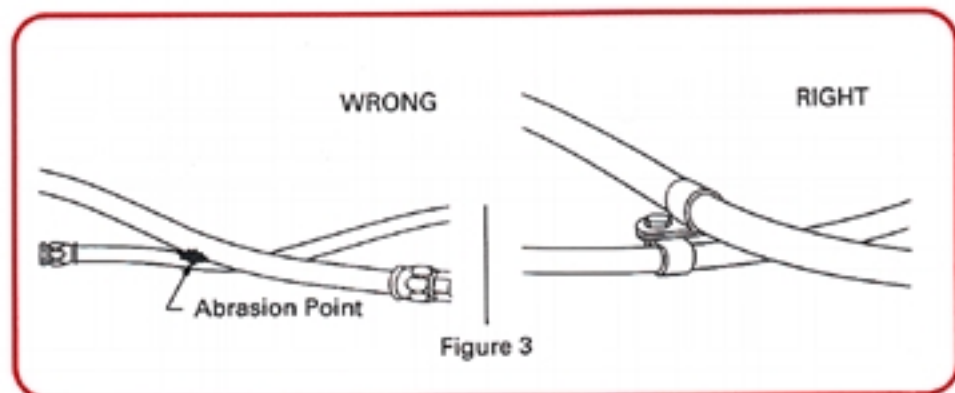


Figure 2

## Proper Installation

- a. Do not exceed minimum bend radius during handling, storage or installation (see minimum bend radius charts). If the bend radius is exceeded, the hose will tend to flatten and kink. If the hose is kinked, it should be discarded. An adequate bend radius will help prevent the hose line from collapsing or restricting flow. (See Figure 1.)
  - b. During installation, assemblies should be positioned so the flexible portion of the hose extends at least one inch behind the socket before the start of the bend.
  - c. Remember that the hose will change in length (up to 4% shorter or 2% longer) when pressurized to the maximum operating pressure. Provide slack or bend in the hose to compensate for any changes which might occur. (See Figure 2.)
  - d. Route and clamp the hose to prevent it from contacting another hose line or other abrasion point. (See Figure 3.)
- CAUTION:** In securing the support clamps, care should be exercised in distributing hose slack between the hose connections and the clamps. Do not bend or force the hose to a sharp angle at any location. Be sure that gradual curves are used for all routing. Clamps must never pinch the hose line or cause it to be subjected to tension, torsion, compression or shear stress. Undersize or oversize hose support clamps must be avoided.
- e. Torque the fitting connection to the recommended values. Using two wrenches, turn the swivel nut with one while holding the nipple and socket hex with the other to prevent the hose from twisting.



# Minimum Bend Radius for Aeroquip Teflon Hose

## 2807 & FC186 Single Wire Braid Cover Smooth Bore Teflon Hose

Size	Minimum Bend Radius (inches)
- 03	1.50*
- 04	2.00
- 05	3.00
- 06	4.00
- 08	5.25
- 10	6.50
- 12	7.75
- 16	9.00*
- 20	16.00*

\*FC186 not available in this size.

## FC469 Hi-Pac<sup>®</sup> Wire Braid Cover Smooth Bore Teflon Hose

Size	Minimum Bend Radius (inches)
- 06	2.50
- 08	2.88
- 10	3.25
- 12	3.88

## 2808 Double Wire Braid Cover Smooth Bore Teflon Hose

Size	Minimum Bend Radius (inches)
- 08	4.62
- 10	5.50
- 12	6.50
- 16	7.38
- 20	11.00
- 24	14.00

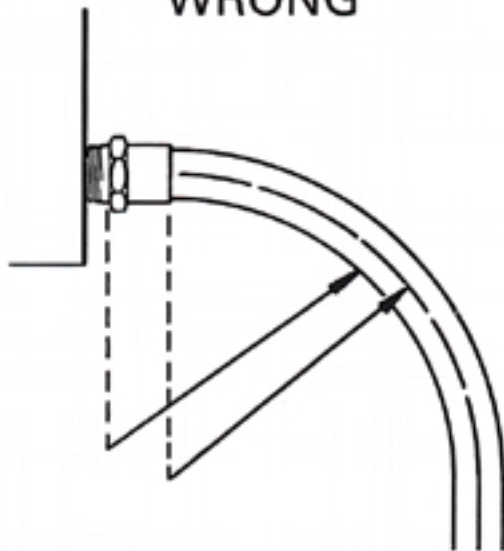
## FC363, FC364, FC563 and F564 Convuluted Teflon Hose

Size	Min. Bend Radius (inches)	Min. Kink Radius* (inches)
- 08	2.88	1.00
- 12	3.75	2.00
- 16	5.00	2.50
- 20	6.25	3.50
- 24	7.50	4.50
- 32	10.00	6.00
- 40	12.50	8.50
- 48	15.00	11.00

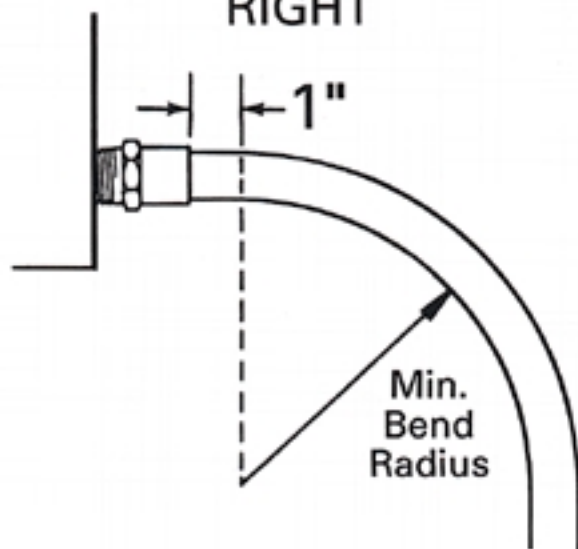
\*Kink radius is the minimum radius during handling that will not damage hose.

## How to Measure Bend Radius

WRONG



RIGHT



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