



Hose measurement

Different couplings require different measurement techniques. When measuring hose, it should always be borne in mind that temperature changes in the environment affect the rubber. Temperature variations can also affect the hose through the media transported inside the hose. All hoses made of polymeric materials, such as rubber and plastic, are affected by temperature changes. The dimension of the hose can change, so in order for the hose not to twist, bend or detach from the coupling, the flexibility of the hose is required, especially when the flow rate changes and the pressure varies.

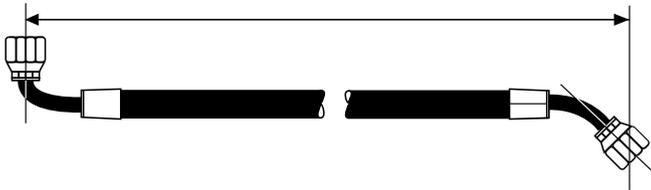
The hose also has a bending radius that determines how tightly you can bend the hose before it gets damaged. Here you will find a guide on how you should measure the hose length for best results. When you need flexibility under pressure, hose is your best choice.

How to measure your hose



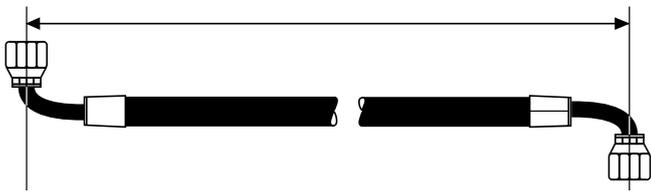
Internally threaded couplings

- Measure the length between the sealing surfaces.



90° and 45° angle couplings

- Measure the length between the angle and the C/L of the sealing surface.



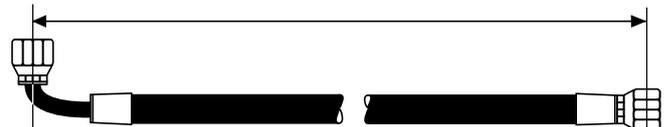
90° angle couplings

- Measure the length between the angles C/L.



Externally threaded couplings

- Measure the length between the sealing



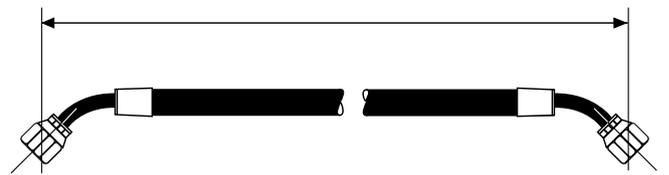
Internally threaded and 90° angle coupling

- Measure the length between the angle C/L and the seal surface.



Externally and internally threaded couplings

- Measure the length between the sealing surfaces.



45° angle couplings

- Measure the length between the C/L of the sealing surfaces.



Banjo couplings

- Measure the length between the C/L of the holes.

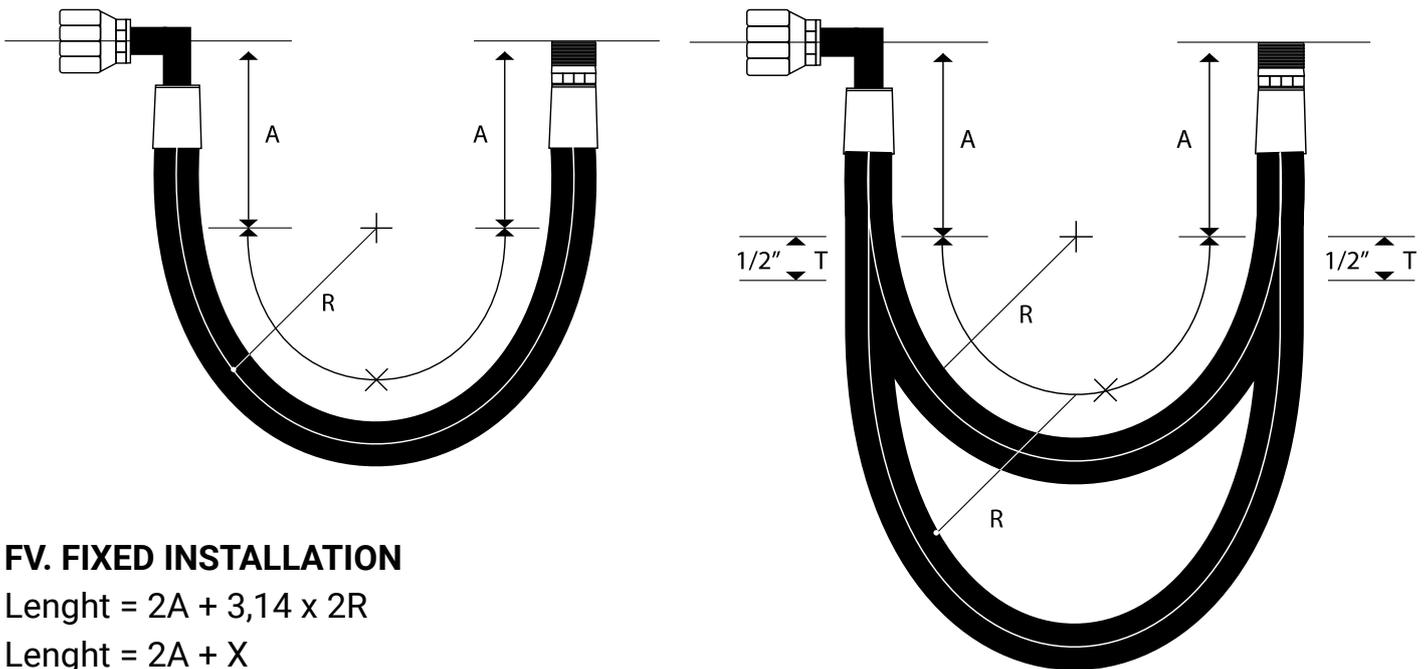
This is how long the hose should be

What is a hose length?

The hose length is a determination of how long the hose should be. The hose length is the measurement from end to end when cutting the hose. As mentioned above, the length is sometimes measured between the seal faces and sometimes between the centerline in order for the measurement to be correct with your intended coupling. Just as there are lots of dimensions of hose, the variation of hose lengths is large.

How to calculate the hose length?

It is important to take into account that the hose needs some flexibility when measuring the length of hose needed. Most installations of mounted hose require at least one bend on the hose. To obtain the maximum life of the hose, it is important to avoid any tension in the hose. The following installations for calculating the correct hose length are intended as a guide for designers.



FV. FIXED INSTALLATION

$$\text{Length} = 2A + 3,14 \times 2R$$

$$\text{Length} = 2A + X$$

FH. MOBILE INSTALLATION

$$\text{Length} = 2A + X + T$$

To avoid stresses, a short length of hose at each end should be allowed to be straight so that the bend starts some distance from the sleeve. Using the formula shown in the pictures above avoids stresses that shorten the life of the hose.