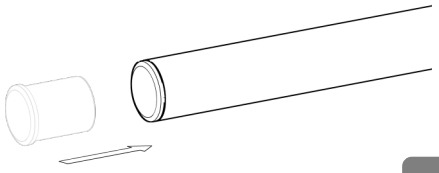
Assembly Guide

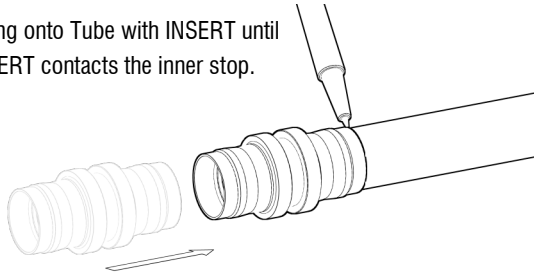
Tube surface must be clean, free from scratches or any surface imperfections, and de-burred inside and out.

Place tube support INSERT in to clean and de-burred tube.



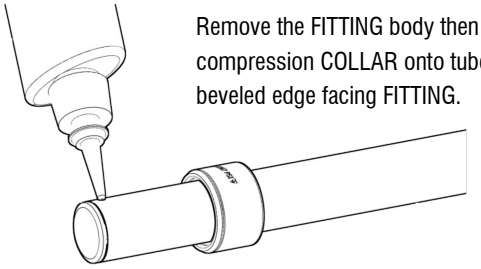
1

Place Fitting onto Tube with INSERT until TUBE/INSERT contacts the inner stop.



Mark Tube at end of FITTING with permanent felt tip marker.

2

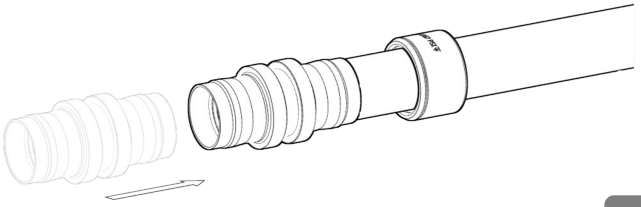


Remove the FITTING body then slide the compression COLLAR onto tube with the beveled edge facing FITTING.

Apply LocTite® to full circumference of tube end.
Keep LocTite® 1/8" from end of TUBE and INSERT.

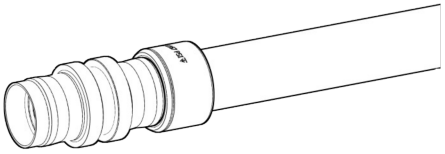
3

Slide the FITTING body back onto the TUBE with INSERT in place until TUBE/INSERT contacts the fitting inner stop.



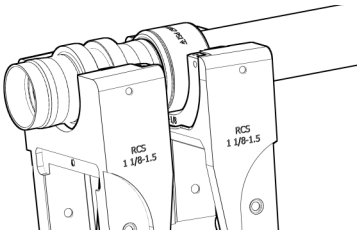
4

Keeping the TUBE/INSERT against the FITTING inner stop, slide the COLLAR against the FITTING. Collar should overlap the FITTING body.



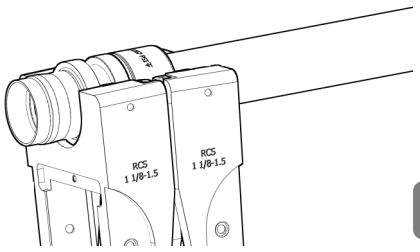
5

Place the FITTING and COLLAR into correct size press clamps. The assembly MUST be fully seated on the lower circumference of the clamps. Do not change the insertion depth of the TUBE/INSERT and the connecting joint.



6

Using the press tool, press the COLLAR onto the FITTING body until it is fully seated against FITTING stop. TUBE/INSERT must be maintained against the FITTING inner stop during the pressing operation.



7

- That the tube insert depth reference mark is visible and closely aligned with the end of the FITTING body.
- That the COLLAR is in the correct orientation, fully seated, and is flush against the shoulder of the FITTING body.
- That any gap between the COLLAR and the FITTING shoulders are less than 1mm.

8

Troubleshooting Guide

Problems	Possible Causes	Remedy
The tube insert does not fit inside the tubing	The tube end was not de-burred	De-burr the tube ID
	The tube end is out-of-round	Make a new square cut and de-burr
The insert appears to be too loose	Incorrect tube type or wall thickness	Ensure that tube wall thickness is within tolerance for ACR Type L copper tubing
	Incorrect size or type of tube insert	Use a correct sized insert
The tube does not fit inside the fitting body	Incorrect size or type of tubing	Check size and type of tubing
	Incorrect size or type of fitting	Check size and type of fitting
	Burrs on the tube OD	De-burr the tube OD
	Tube is out of round	Make a new square cut and de-burr
	Fitting inlet is damaged	Use a new fitting
The compression collar does not engage over the fitting starting end	Incorrect size compression collar	Use the correct size of compression collar
	Incorrect type or size of fitting	Use the correct type or size of fitting
	The compression collar is installed in the wrong direction	Install the compression collar with the beveled edge facing the fitting
	Loctite is applied to or collected between the compression collar and the fitting body	Do not apply Loctite to the OD of the fitting
		Wipe off excess Loctite before compressing the compression collar on to the fitting
	The tube is not completely inserted inside the fitting	Mark the tube insertion depth reference line and confirm it is visible before and after compression
Excessive gap of more than 1mm between the compression collar and the fitting shoulder	The fitting was not fully seated inside the tool compression clamps or the clamp inserts	Completely seat the entire fitting assembly into the tool clamp or tool insert landing before compressing
The collar is not on flush	The tool was not held in square alignment with the fitting during compression	Ensure proper and square alignment between the fitting and the tool during compression
The compression collar cracked or split	Incorrect size of tool clamp or clamp insert was used	Use a correct size clamp or clamp insert
The shoulder of the fitting body is broken	The tool clamps were not completely seated in the tool alignment slots	Fully seat the clamps on to the tool and tighten the thumb screws
The fitting body is deformed	When retracted, the tool hydraulic ram, backed against an adjacent obstruction	Position the hand tool so that there is no obstruction in the area at the back of the tool when the hydraulic ram is retracted
	The tool clamp insert dislodged from the universal clamp	Inspect the clamp and clamp insert. Adjust the clamp ball detent screws to secure the insert or replace the universal clamp

⚠ **WARNING**: Only RSC tube inserts are allowed. Use of tube inserts from other manufacturers is prohibited.

⚠ **WARNING**: Only RSC compression collars are allowed. Use of collars from other manufacturers is prohibited.

⚠ **WARNING**: RCS fittings are single-use permanent fittings and cannot be removed or repaired after installation. If the fitting is deemed not visually acceptable prior to, during, or after the installation, the fitting must be cut out and a new one correctly reinstalled.