

Simple tube connection and disconnection - no tools required

Fewer component parts - Internally machined form in body to secure collet reduces number of potential leak paths

Corrosion resistant

Easy identification - All collets marked with tube size **Total fittings system solution** 

Reduced assembly & maintenance times provide time/labor savings

Greater reliability and reduced testing

Ease of tube insertion in areas of restricted access



#### **Technical data**

# **Operating Medium:**

Compressed air

### **Maximum Working Pressure:**

0 to 150 psi (0 to 10 bar)

**Working Temperature:** 

-40°F to 220°F (-40°C to 100°C)

#### Materials:

Body (Straights), Tube support, Collet - Brass BS 2874 CZ 121 Body (Elbows, Tees) - Brass BS 2874 CZ 122

'O' Ring - Buna N (Low Nitrile). Thread Sealant - Precoat 5

#### **Tubing:**

Tube should be to SAE J844 (Imperial) or DIN 74324 (Metric)

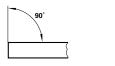
#### Standards & Legislation:

Fittings and Tubing Comply to Department Of Transport Federal Motor Vehicle Safety Standard,

(DOT FMVSS 106) (Mandatory requirements for Inch tube fittings in U.S.A.)

Society for Automotive Engineers (SAE) J2494 (Inch tube and fittings) and meet DIN 74324 and German TÜV requirements (Metric Tube and Fittings)

#### **Tube Connection / Disconnection**





- 1. Ensure that the end of the tube is cut square and is free from burrs.
- 2. Push the tube through the collet into the fitting.

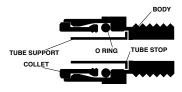


3. Continue pushing the tube through the 'O' ring until it bottoms on the tube stop. Then pull back on the tube to reinforce the collet teeth gripping action.



4. To disconnect - First ensure there is no air present. Push the tube into the fitting until it bottoms on the tube stop. Then hold down the collet and withdraw the tube.

#### **Component Functions**



Body—The body has an internally machined form to secure the collet(s), "O" ring(s) and Tube support(s). It also has internal & externally machined thread form(s) for connection to ports where applicable.

Collet - The purpose of the collet is to grip the tube and ensure it is retained by the fitting at all times. "O" Ring-The "O" ring is to ensure adequate interference between the tube & fitting body therefore providing a pneumatic seal at all times.

**Tube Support**—The tube support prevents the tube collapsing during extreme tensile loading conditions. Such conditions are only encountered during performance testing and far exceed those experienced during normal use.





#### **Male Connectors NPT**

O/D tube	NPT	Product number
3/16"	1/8"	95453003M
1/4"	1/16"	95453001M
1/4"	1/8"	95453004M
1/4"	1/4"	95453010M
1/4"	3/8"	95453018M
3/8"	1/8"	95453006M
3/8"	1/4"	95453012M
3/8"	3/8"	95453020M
3/8"	1/2"	95453029M
1/2"	1/4"	95453013M
1/2"	3/8"	95453021M
1/2"	1/2"	95453030M
5/8"	3/8"	95453022M
5/8"	1/2"	95453031M
3/4"	1/2"	95453049M
3/4"	3/4"	95453055M



# Female Connectors NPT Female

O/D tube	B NPT	Product number
1/4"	1/8"	95435504M
1/4"	1/4"	95435510M
3/8"	1/8"	95435506M
3/8"	1/4"	95435512M
3/8"	3/8"	95435520M
1/2"	1/2"	95435530M



IMI NORGREN

85530M

### **Bulkhead Unions Metric**

0/D		Product
tube	Thread	number
1/4"	M15 x 1.0	94450704M
3/8"	M20 x 1.5	94450706M
1/2"	M24 x 1.5	94450707M



# **Reducing Unions Inch**

O/D tube	Tube tube	Product number
3/8"	1/4"	94450448M
1/2"	3/8"	94450464M



SAE 630101

# Female Bulkhead

# Connectors NPT Female, UNF

O/D tube	NPT female	C Unf	Product number
1/4"	1/8"	5/8"	95457006M
1/4"	1/4"	5/8"	95457001M
3/8"	1/4"	3/4"	95457003M
3/8"	3/8"	3/4"	95457004M
1/2"	3/8"	7/8"	95457005M
1/2"	1/2"	7/8"	95457007M



# **Male Elbows NPT**

O/D tube	NPT	Product number
3/16"	1/8"	95433103M
1/4"	1/8"	95433104M
1/4"	1/4"	95433110M
1/4"	3/8"	95433118M
1/4"	1/2"	95433127M
3/8"	1/8"	95433106M
3/8"	1/4"	95433112M
3/8"	3/8"	95433120M
3/8"	1/2"	95433129M
1/2"	1/4"	95433113M
1/2"	3/8"	95433121M
1/2"	1/2"	95433130M
5/8"	3/8"	95433198M
5/8"	1/2"	95433131M
3/4"	1/2"	95433149M
3/4"	3/4"	95433155M



SAE 630202

# **Male Connectors Metric**

0/D		Product
tube	Thread	number
1/4"	M10 x 1.0	94466631M
1/4"	M12 x 1.5	94466633M
1/4"	M16 x 1.5	94466635M
3/8"	M12 x 1.5	94466653M





#### **Male Hobbs Elbows Metric**

O/D tube	Thread	Product number
1/4"	M10 x 1.0	94413831BP
1/4"	M12 x 1.5	94413833M
1/4"	M16 x 1.5	94413835M
3/8"	M12 x 1.5	94413853M
3/8"	M16 x 1.5	94413855BP
3/8"	M22 x 1.5	94413858
1/2"	M16 x 1.5	94413865
1/2"	M22 x 1.5	94413868BP
5/8"	M16 x 1.5	94413879BP
5/8"	M22 x 1.5	94413875BP
3/4"	M22 x 1.5	94413898BP



# **Male Swivel Elbows NPT**

0/D		Product
tube	NPT	number
1/4"	1/8"	95411404M
1/4"	1/4"	95411410M
1/4"	3/8"	95411418M
3/8"	1/8"	95411406M
3/8"	1/4"	95411412M
3/8"	3/8"	95411420M
3/8"	1/2"	95411429M
1/2"	1/4"	95411413M
1/2"	3/8"	95411421M
1/2"	1/2"	95411430M
5/8"	1/2"	95411431M
3/4"	1/2"	95411449M



**SAE 6302AA** 

CAUTION: Swivel adapters are not suitable for use in continuously rotating or gyrating applications.

# Plug\*

O/D stem	Part number
1/4"	94050904BP
3/8"	94050906BP
1/2"	94050907BP



\*Material: Thermoplastic

#### 45° Male Elbows NPT

0/D		Product
tube	NPT	number
1/4"	1/8"	95460004M
1/4"	1/4"	95460010M
3/8"	1/8"	95460006M
3/8"	1/4"	95460012M
3/8"	3/8"	95460020M
3/8"	1/2"	95460029M
1/2"	1/4"	95460013M
1/2"	3/8"	95460021M
1/2"	1/2"	95460030M
5/8''	3/8"	95460022M
5/8"	1/2"	95460031M
3/4"	1/2"	95460049M



**SAE 630302** 

### **Female Elbows NPT**

A O/D tube	B NPT	Product number
3/16"	1/8"	95456401BP
1/4"	1/4''	95456410BP
1/4"	1/8"	95456204M
3/8"	3/8"	95456420BP
1/2"	1/2"	95456430BP



**SAE 630203** 

#### **Union Elbows**

O/D tube	Part number
1/4"	94451104BP
3/8"	94451106M
1/2"	94451107M



# **Male Branch Tees NPT**

O/D tube	O/D tube	NPT	Product number
1/4"	1/4"	1/8"	95459002M
1/4"	1/4"	1/4"	95459012M
1/4"	1/4"	3/8"	95459019M
3/8"	1/4"	1/4"	95459016M
3/8"	3/8"	1/4"	95459010M
3/8"	3/8"	3/8"	95459001M
1/2"	1/4"	1/4"	95459009M
1/2"	1/4"	3/8"	95459006M
1/2"	1/4"	1/2"	95459008M
1/2"	3/8"	1/2"	95459014M
1/2"	1/2"	1/4"	95459013M
1/2"	1/2"	1/2"	95459004M
5/8"	1/2"	3/8"	95459015M
5/8"	1/2"	1/2"	95459007M



**SAE 630425** 

# Male Bulkhead Elbows NPT Female, UNF

0/D	NPT		Product
tube	female	UNF	number
1/4"	1/8"	5/8"	95459704M
1/2"	3/8"	7/8"	95459702M



**SAE 631403** 

# **Double Elbow Adapters NPT**

0/D	0/D		Product
tube	tube	NPT	number
1/4"	1/4"	1/8"	95476101M
1/4"	1/4"	3/8"	95476113M





# Male Swivel Branch Tees NPT

O/D tube	NPT	Product number
3/16"	1/8"	95411103M
1/4"	1/8"	95411104M
3/8"	1/4"	95411112M
3/8"	3/8"	95411120M
1/2"	1/4"	95411113M
1/2"	3/8"	95411121M
1/2"	1/2"	95411130M



**SAE 6304AC** 

CAUTION: Swivel adapters are not suitable for use in continuously rotating or gyrating applications.

# **Male Run Tees NPT**

O/D tube	O/D tube	NPT	Product number
1/4"	1/4"	1/8"	95458628M
1/4"	1/4"	1/4"	95458613M
1/4"	1/4"	3/8"	95458617M
1/4"	3/8"	1/4"	95458621M
1/4"	3/8"	3/8"	95458607M
1/4"	1/2"	3/8"	95458606A
3/8"	1/4"	1/4"	95458605M
3/8"	1/4"	3/8"	95458627M
3/8"	3/8"	1/4"	95458603M
3/8"	3/8"	3/8"	95458610M
3/8"	3/8"	1/2"	95458604M
3/8"	1/2"	3/8"	95458626M
1/2"	3/8"	3/8"	95458620M
1/2"	1/2"	1/4"	95458616M
1/2"	1/2"	3/8"	95458611M



**SAE 630424** 

### **Male Swivel Run Tees NPT**

O/D tube	NPT	Product number
1/4"	1/8"	95411204M
1/4"	1/4"	95411210M
3/8"	1/4"	95411212M
3/8"	3/8"	95411220M
1/2"	3/8"	95411221M
1/2"	1/2"	95411230M



**SAE 6308AB** 

# Special 90° Tees NPT

O/D tube	O/D tube	NPT	Product number
1/4"	1/4"	1/4"	95458901A
3/8"	3/8"	1/4"	95458916M
3/8"	1/2"	1/2"	95458907M
1/2"	1/2"	1/2"	95458902M
1/2"	5/8"	1/2"	95458905BP
5/8"	3/8"	1/2"	95458920M
5/8"	5/8"	1/2"	95458906M



### 90° Fixed Tee

O/D tube	NPT female	NPT	Product number
3/8"	1/8"	3/8"	95456503M
3/8"	1/8"	1/4"	95456504M
1/2"	1/8"	3/8"	95456501M
1/2"	1/4"	1/2"	95456502M



Note: Ports are threaded on side shown.

# **Union Tee**

O/D tube	Product number
1/4"	94451404M
3/8"	94451406M
1/2"	94451407M
5/8"	94451408M



SAE 630401