

# Fluororesin (PFA) Tube

## Features

- Superior chemical and weather resistance makes Fluororesin Tube best suited for chemical, food-processing, medical care and semiconductor applications.
- Applicable to Die cooling due to its extensive service temperature range.
- Superior interior surface smoothness, transparency and purity.
  - ◆ Applicable: Tube fitting stainless SUS316, Tube fitting SUS303 equiv.
  - Tube fitting SUS304, Die temperature control fitting

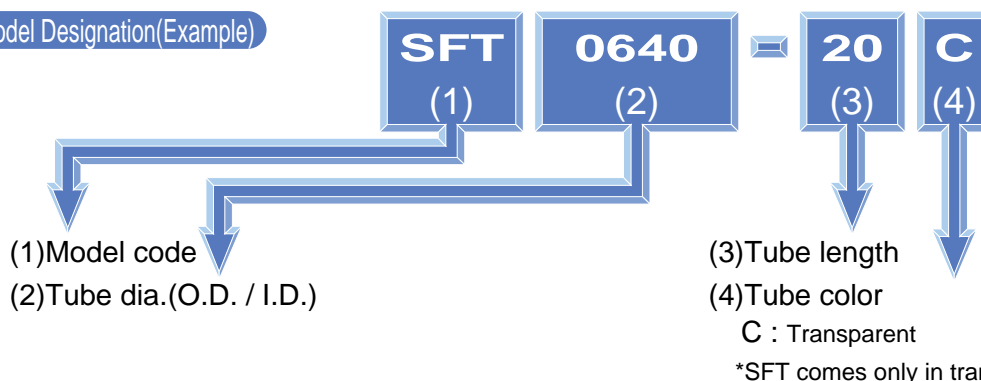
## Specification

Fluid admitted	Air, Water, Corrosive fluids, etc <sup>*1</sup>
Service pressure range	0~150psi (0~0.9MPa) room temperature <sup>*2</sup>
Service temperature range	-85~500°F (-65~260°C) (No freezing)

### Warning

- \*1 When using with chemicals, refer to table 1 reference material on "Chemical-proof Properties" on page 559.
- \*2 Burst pressure drops as temperature rises. When using the tube under high temperatures, therefore, refer to table 2 on page 559.
- \*3 When using fluids, we recommend the use of an insert ring.

## Model Designation(Example)

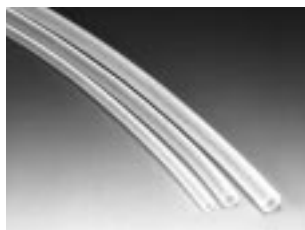


## ⚠ Detailed Safety Instructions

Before using the PISCO device, be sure to read the "Safety Instructions", "Common Safety Instructions for Products Listed in This Manual" on pages 23~24 and "Common Safety Instructions for Tubes" on page 551.

## SFT

Fluororesin (PFA) Tube



Model	Tube O.D. (φmm)	Tube I.D. (φmm)	Standard length (m)	Min.bend radius (mm)	Burst pressure (MPa)	Mass (g/m)
SFT 0425	4	2.5	5·20·50·100	20	7.84	18
SFT 0640	6	4	5·20·50·100	30	6.86	36
SFT 0860	8	6	5·20·50·100	48	4.90	50
SFT 1075	10	7.5	5·20·50·100	60	4.90	78
SFT 1290	12	9	5·20·50·100	72	4.90	112
SFT 1613	16	13	5·20·50·100	-	3.43	154

\*Consult PISCO for table 3 of special Dimensions on page 560.

# Tube Series Fluoresin (PFA) Tube

## ⚠ Caution

### ● Attached Table 1 Chemical-Proof Properties

The following chemicals can be admitted to PFA tube. (Service temperature 100°C)

#### ■ Acid

Chemicals
50% acetic acid
Glacial acetic acid
Benzoic acid
Benzenesulfonic acid
Chlorosulfonic acid
50% chromic acid
Citric acid
Fomic acid
50% hydrobromic acid
10% hydrochloric acid
35% hydrochloric acid
30% hydrofluoric acid
70% hydrofluoric acid
10% nitric acid
50% nitric acid
Fuming nitric acid
Oxalic acid
10% phenol
100% phenol
Phthalic acid
30% phosphoric acid
85% phosphoric acid
Succinic acid
50% sulfuric acid
85% sulfuric acid
95% sulfuric acid
Fuming sulfuric acid

#### ■ Ether / Ketone

Chemicals
10% acetone
100% acetone
Acetophenone
Dimethylformamide
Ethyl ether
Ethyl acetate
Ethylene oxide
Ethylene glycol
Glycerin
Methyl cellosolve
Methyl ethyl ketone
Triethyl phosphate

#### ■ Oxidant

Chemicals
Sulfur dioxide
30% hydrogen peroxide
15% chlorine dioxide
Nitrogen dioxide
Ozone
Potassium chlorate
Potassium permanganate
17% sodium hypochlorite
Benzoyl peroxide

#### ■ Halogen hydrocarbon

Chemicals
Allyl chloride
Carbon tetrachloride
Benzene chloride
Chloroform
Ethylene dichloride
Ethylene bromide
Fleon R-113(coolant)

#### ■ Base

Chemicals
30% aqueous ammonia
Aniline
Brium hydroxide
Calcium hydroxide
Hexamethy-diamine
Magnesium hydroxide
propyl amine
Sodium carbonate
10% sodium hydroxide
50% sodium hydroxide

#### ■ Gas

Chemicals
Ammonia unhydride
Carbon dioxide
Hydrogen
Methane
Hydrogen sulfide

#### ■ Aromatic hydrocarbon

Chemicals
Benzene
Naphthalene
Toluene

## ⚠ Caution

### ● Attached Table 2 Burst Pressure

Size	Temperature			
	77°F (25°C)	122°F (50°C)	167°F (75°C)	212°F (100°C)
4×2.5	7.84	5.88	4.41	3.43
6×4	6.86	4.90	3.92	2.94
8×6	4.90	3.43	2.94	1.96
10×7.5	4.90	3.43	2.94	1.96
12×9	4.90	3.43	2.94	1.96
16×13	3.43	2.45	1.96	1.47

unit:MPa

\*We recommend use at service pressure being one fourth or less of the burst.

● Attached Table 3 Special Dimensions

Unit:mm

Size (O.D. × I.D.)	Thickness	Dimensional allowance		Standard length (m)
		O.D.	I.D.	
4 × 2	1.0	±0.1	±0.08	10,50,100
7 × 5	1.0	±0.1	±0.08	10,50,100
10 × 7	1.5	±0.1	±0.08	10,50,100
10 × 8	1.0	±0.1	±0.08	10,50,100
12 × 10	1.0	±0.1	±0.08	10,50,100
13 × 10	1.5	±0.1	±0.08	10,50,100
13 × 11	1.0	±0.1	±0.08	10,50,100
14 × 12	1.0	±0.1	±0.08	10,50,100
15 × 13	1.0	±0.1	±0.08	10,50,100
16 × 14	1.0	±0.1	±0.08	10,50,100
17 × 14	1.5	±0.1	±0.08	10,50,100
18 × 16	1.0	±0.1	±0.08	10,50,100
19 × 16	1.5	±0.1	±0.08	10,50,100
23 × 20	1.5	±0.15	±0.08	10,50,100
3.17 × 1.59	0.79	±0.1	±0.05	10,50,100
3.17 × 2.18	0.495	±0.1	±0.05	10,50,100
6.35 × 3.17	1.59	±0.1	±0.08	10,50,100
6.35 × 3.96	1.195	±0.1	±0.08	10,50,100
6.35 × 4.35	1.0	±0.1	±0.08	10,50,100
6.35 × 4.57	0.89	±0.1	±0.08	10,50,100
9.53 × 6.35	1.59	±0.1	±0.08	10,50,100
9.53 × 7.53	1.0	±0.1	±0.08	10,50,100
12.7 × 9.53	1.585	±0.1	±0.08	10,50,100
12.7 × 10.7	1.0	±0.1	±0.08	10,50,100
19.05 × 15.88	1.585	±0.1	±0.08	10,50,100
25.4 × 22.26	1.57	±0.15	±0.08	10,50,100
2.8 × 2	0.4	±0.1	±0.08	50,100
4 × 3	0.5	±0.1	±0.08	50,100
5 × 4	0.5	±0.1	±0.08	50,100
6 × 5	0.5	±0.1	±0.08	50,100
7 × 6	0.5	±0.1	±0.08	50,100
8 × 7	0.5	±0.1	±0.08	50,100
9 × 8	0.5	±0.1	±0.08	50,100
10 × 9	0.5	±0.1	±0.08	50,100
11 × 10	0.5	±0.1	±0.05	50,100
12 × 11	0.5	±0.1	±0.05	50
13 × 12	0.5	±0.1	±0.08	50
14 × 13	0.5	±0.1	±0.08	50
15 × 14	0.5	±0.1	±0.08	50

\*Tube size listed in the above table are produced as custom-products.