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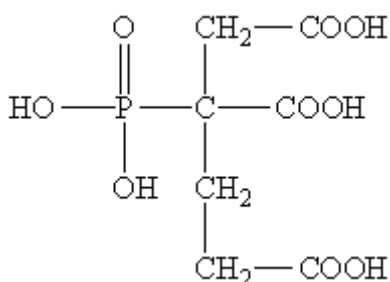
## 2-Phosphonobutane -1,2,4-Tricarboxylic Acid (PBTCA)

CAS No. 37971-36-1

Molecular Formula:  $C_7H_{11}O_9P$

Molecular weight: 270.13

Structural Formula:



### Properties:

PBTCA has low content of phosphoric, has structural features of both phosphoric acid and carboxylic acid group, which enable its excellent scale and corrosion inhibition properties. Its antiscaling property under high temperature is far better than that of organophosphines. It can improve zinc salt solubility, has good chlorine oxidation tolerance and good composite synergy.

### Specification:

items	index
Appearance	Colorless or light yellow transparent liquid
Active acid %	50.0 min
Phosphorous acid(as $PO_3^{3-}$ )%	0.8 max
Phosphorous acid(as $PO_4^{3-}$ )%	0.5 max

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Density (20°C) g/cm <sup>3</sup>	1.27 min
pH(1% solution)	1.5~2.0

**Usage:**

PTBCA is a high efficient agent as scale and corrosion inhibitor. It is the excellent stabilizer for zinc salt. It is widely used in circulating cool water system and oilfield refill water system as scale and corrosion inhibitor, suitable to composite with zinc salt and copolymer. It can be used in situations of high temperature, high hardness, high alkali and high concentration index. In lavation fields, it is used as chelating agent and metal detergent.

PBTCA is usually used together with zinc salt, copolymer, organophosphine, imidazole and other Water Treatment Chemicals. When used alone, the dosage of 5-15mg/L is preferred.

**Package and Storage:**

Normally In 250kg net Plastic Drum, IBC drum can also be used as required. Storage for one year in room shady and dry place.

**Safety Protection:**

Acidity, Avoid contact with eye and skin, once contacted, flush with water.