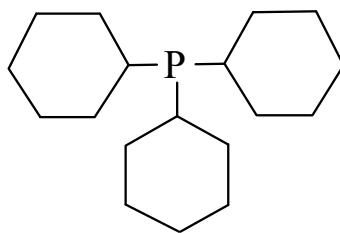




>>Entry Name: Tricyclohexylphosphine, 9CI



CAS Registry Number: 2622-14-2

Molecular Formula:  $C_{18}H_{33}P$

Molecular Weight: 280.432

Accurate Mass: 280.231987

Percentage Composition: C 77.09%; H 11.86%; P 11.05%

Use/Importance: Ligand for metals of Groups of IB, IIB, VIB, VIIB and VIII

Physical Description: Air-sensitive cryst.

Melting Point: Mp 76-78°

pKa Value:  $pK_a$  9.7 ( $H_2O$ )

Aldrich: 26197-1

Fluka: 91488

>>Derivative: Methiodide

Synonym(s): Tricyclohexylmethylphosphonium iodide

Molecular Formula:  $C_{19}H_{36}IP$

Molecular Weight: 422.372

Accurate Mass: 422.159935

Percentage Composition: C 54.03%; H 8.59%; I 30.05%; P 7.33%

Physical Description: Solid

Melting Point: Mp 185-186°

>>Derivative: Oxide

CAS Registry Number: 13689-19-5

Molecular Formula:  $C_{18}H_{33}OP$

Molecular Weight: 296.432

Accurate Mass: 296.226902

Percentage Composition: C 72.93%; H 11.22%; O 5.40%; P 10.45%

Physical Description: Cryst. (EtOH or toluene)

Melting Point: Mp 155-157°

pKa Value:  $pK_a$  9.39 ( $MeNO_2$ )

>>Derivative: Sulfide

CAS Registry Number: 42201-98-9

Molecular Formula:  $C_{18}H_{33}PS$

Molecular Weight: 312.498

Accurate Mass: 312.204057

Percentage Composition: C 69.18%; H 10.64%; P 9.91%; S 10.26%

Use/Importance: Useful for extraction of lanthanides and actinides

Physical Description: Cryst. (EtOH or  $Me_2CO$ )

Melting Point: Mp 185°