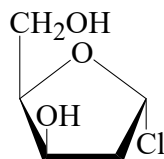




>>Entry Name: 2-Deoxyribofuranosyl chloride

Synonym(s): 2-Deoxy-*erythro*-pentofuranosyl chloride, 9Cl



α -D-*form*

Molecular Formula: C₅H₉ClO₃

Molecular Weight: 152.577

Accurate Mass: 152.024022

Percentage Composition: C 39.36%; H 5.95%; Cl 23.24%; O 31.46%

>>Variant: α -D-form

CAS Registry Number: 73793-20-1

Molecular Formula: C₅H₉ClO₃

Molecular Weight: 152.577

Accurate Mass: 152.024022

Percentage Composition: C 39.36%; H 5.95%; Cl 23.24%; O 31.46%

>>Derivative: 3,5-Bis(4-methylbenzoyl)

Synonym(s): 2-Deoxy-3,5-di-*O*-toluoyl- α -D-*erythro*-pentofuranosyl chloride

CAS Registry Number: 4330-21-6

Extra CAS Registry Numbers(s): 3601-89-6

Molecular Formula: C₂₁H₂₁ClO₅

Molecular Weight: 388.847

Accurate Mass: 388.107752

Percentage Composition: C 64.87%; H 5.44%; Cl 9.12%; O 20.57%

Use/Importance: Widely used precursor for synth. of deoxyribonucleosides

Physical Description: Cryst. (toluene or CCl₄)

Melting Point: Mp 109° (dec.)

Optical Rotation: [α]_D²⁰ +110.1 (c, 2.04 in DMF)

Other Data: Dec. in moist air. Anomerises to β -form in polar solvs.

>>Derivative: 3,5-Bis(4-chlorobenzoyl)

CAS Registry Number: 21740-23-8

Molecular Formula: C₁₉H₁₇Cl₃O₅

Molecular Weight: 431.698

Accurate Mass: 430.014156

Percentage Composition: C 52.86%; H 3.97%; Cl 24.64%; O 18.53%

Physical Description: Fluffy cryst. (CCl₄)

Melting Point: Mp 131-132°

Optical Rotation: [α]_D²⁵ +109 (c, 1 in CHCl₃)

Other Data: Resolidifies with final melting and dec. at 238-241°

>>Variant: β -D-form

Molecular Formula: C₅H₉ClO₃

Molecular Weight: 152.577

Accurate Mass: 152.024022

Percentage Composition: C 39.36%; H 5.95%; Cl 23.24%; O 31.46%

>>Derivative: 3,5-Bis(4-methylbenzoyl)

Synonym(s): 2-Deoxy-3,5-di-*O*-toluoyl- β -D-*erythro*-pentofuranosyl chloride

CAS Registry Number: 52304-86-6

Molecular Formula: C₂₁H₂₁ClO₅

Molecular Weight: 388.847

Accurate Mass: 388.107752

Percentage Composition: C 64.87%; H 5.44%; Cl 9.12%; O 20.57%

Physical Description: No phys. props. reported