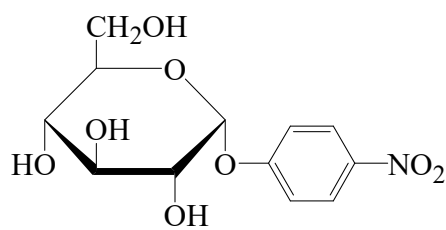




>>Entry Name: 4-Nitrophenyl glucoside, 9CI



α-D-Pyranose-*form*

Related CAS Registry Numbers(s): 5779-46-4

Molecular Formula: C₁₂H₁₅NO₈

Molecular Weight: 301.252

Accurate Mass: 301.079769

Percentage Composition: C 47.84%; H 5.02%; N 4.65%; O 42.49%

Aldrich: 36028-7

Sigma: N1377

>>Variant: *α*-D-Pyranose-*form*

CAS Registry Number: 3767-28-0

Molecular Formula: C₁₂H₁₅NO₈

Molecular Weight: 301.252

Accurate Mass: 301.079769

Percentage Composition: C 47.84%; H 5.02%; N 4.65%; O 42.49%

Use/Importance: Substrate for the assay of *α*-glucosidases (maltase and isomaltase)

Physical Description: Prisms (H₂O)

Melting Point: Mp 216°

Optical Rotation: [*α*]_D²⁰ +220 (c, 1 in H₂O)

Solubility: Sol. (H₂O)

>>Derivative: Tetra-Ac

CAS Registry Number: 14131-42-1

Molecular Formula: C₂₀H₂₃NO₁₂

Molecular Weight: 469.401

Accurate Mass: 469.122029

Percentage Composition: C 51.18%; H 4.94%; N 2.98%; O 40.90%

Physical Description: Acicular prisms (EtOH)

Melting Point: Mp 113°

Optical Rotation: [*α*]_D²⁰ +191 (c, 2 in CHCl₃)

>>Derivative: 3,4,6-Tribenzoyl

CAS Registry Number: 80245-20-1

Molecular Formula: C₃₃H₂₇NO₁₁

Molecular Weight: 613.576

Accurate Mass: 613.158414

Percentage Composition: C 64.60%; H 4.44%; N 2.28%; O 28.68%

Physical Description: Cryst. (EtOH)

Melting Point: Mp 202-205°

Optical Rotation: [*α*]_D²³ +90.1 (c, 0.75 in CHCl₃)

>>Derivative: Tetrabenzoyl

CAS Registry Number: 80245-18-7

Molecular Formula: C₄₀H₃₁NO₁₂

Molecular Weight: 717.684

Accurate Mass: 717.184629

Percentage Composition: C 66.94%; H 4.35%; N 1.95%; O 26.75%

Physical Description: Cryst. (EtOH)

Melting Point: Mp 142-143.5°

Optical Rotation: [*α*]