



3¹-β-D-Cellotriosyl-glucose (Lot 150704)

O-BGTETB

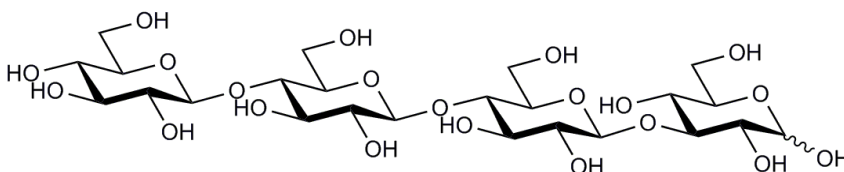
01/16

Synonym: Cellotriosyl-(1→3)-β-D-Glucose, 1,3:1,4-β- Glucotetraose B

CAS: 58484-02-9

Molecular Formula: C₂₄H₄₂O₂₁

MW: 666.6



PREPARATION:

Prepared by controlled enzymic hydrolysis of Barley β-glucan.

PURITY: > 95%

HPLC:

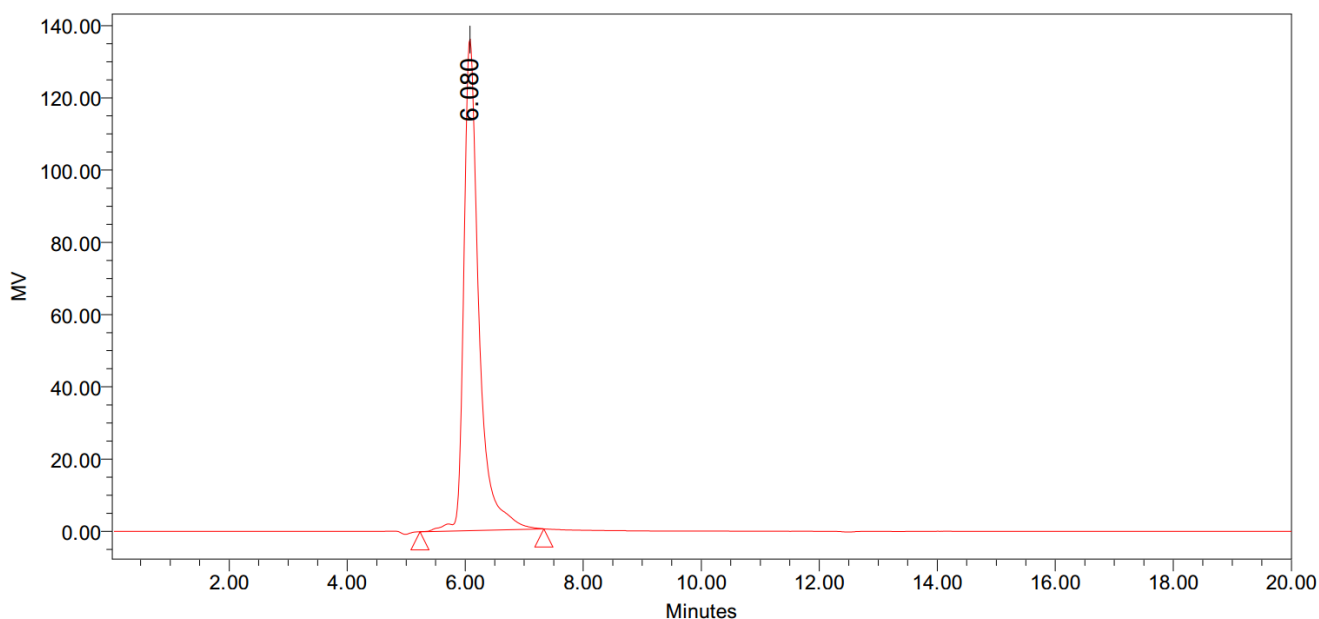
Column: Waters SugarPak I (6.5 x 30 cm)

Temperature: 90°C

Mobile phase: dH₂O with disodium calcium EDTA (50 mg/L) [Sigma Cat No. ED2SC]

Flow rate: 0.5 mL/min

HPLC System: Waters Breeze system, Waters 2410 RI detector and Empower v 2 software



Peak Results

| | Name | RT | Area | % Area | Height | % Height |
|---|------|-------|---------|--------|--------|----------|
| 1 | | 6.080 | 2405261 | 100.00 | 136139 | 100.00 |

HPAEC-PAD:

Column: CarboPac PA200 guard and analytical columns (3 x 250 mm)

Temperature: 30°C

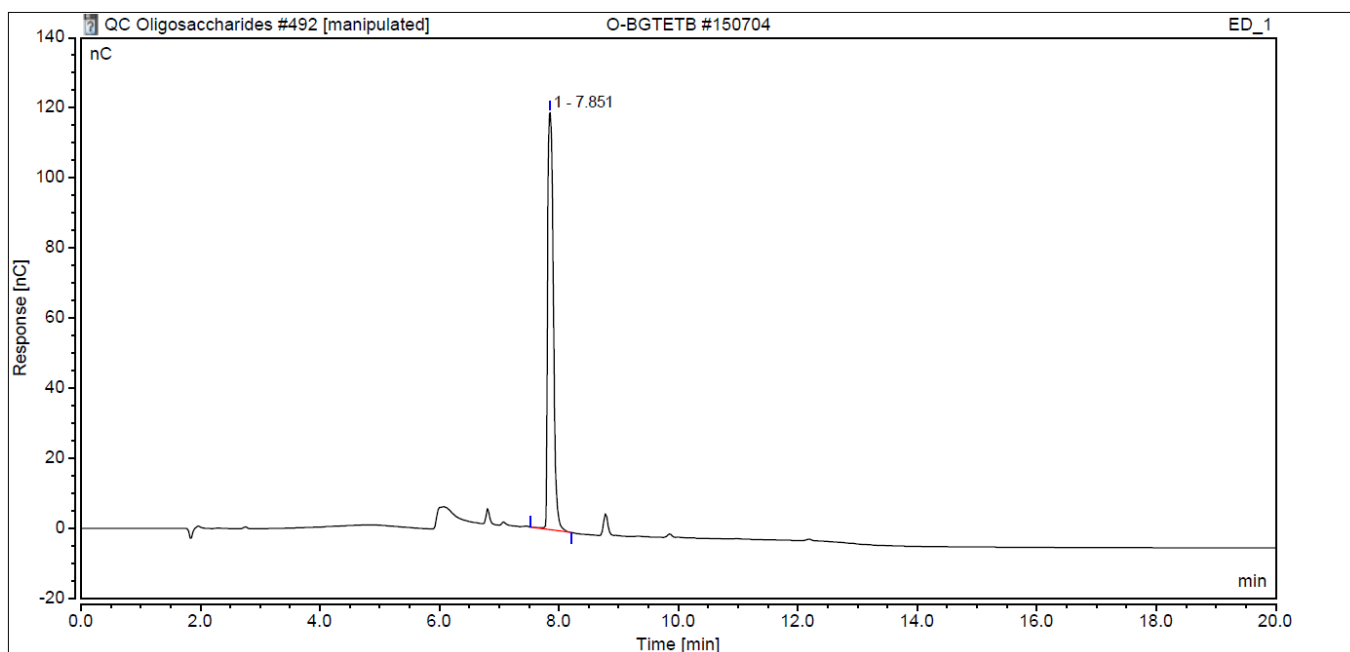
Detector: Au electrode; waveform Carbohydrate, standard quad

Flow rate: 0.5 mL/min

IC system: Dionex ICS5000+ DP system and Chromeleon 7 software

A stepwise linear gradient method was employed as shown.

| Time (min) | 100 mM NaOH (%) | 120 mM NaOAc (%) |
|------------|-----------------|------------------|
| 0 | 100 | 0 |
| 5 | 55 | 45 |
| 9 | 30 | 70 |
| 10 | 0 | 100 |
| 16 | 0 | 100 |

**TLC:** n -Propanol:Ethanol:H₂O = 7:1:2 (run once) on Merck TLC Silicagel 60F₂₅₄