

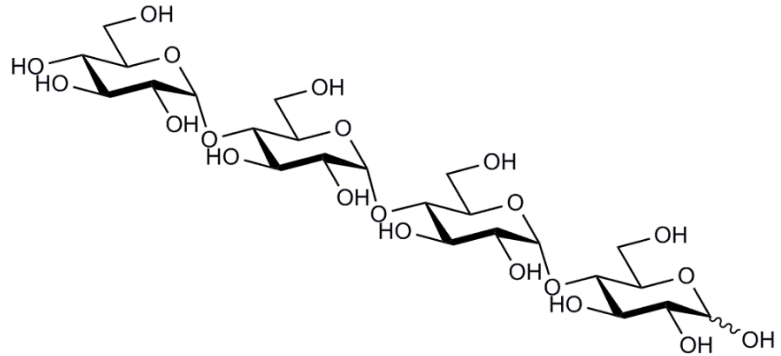


MALTOTETRAOSE (Lot 170704a)

O-MAL4

09/16

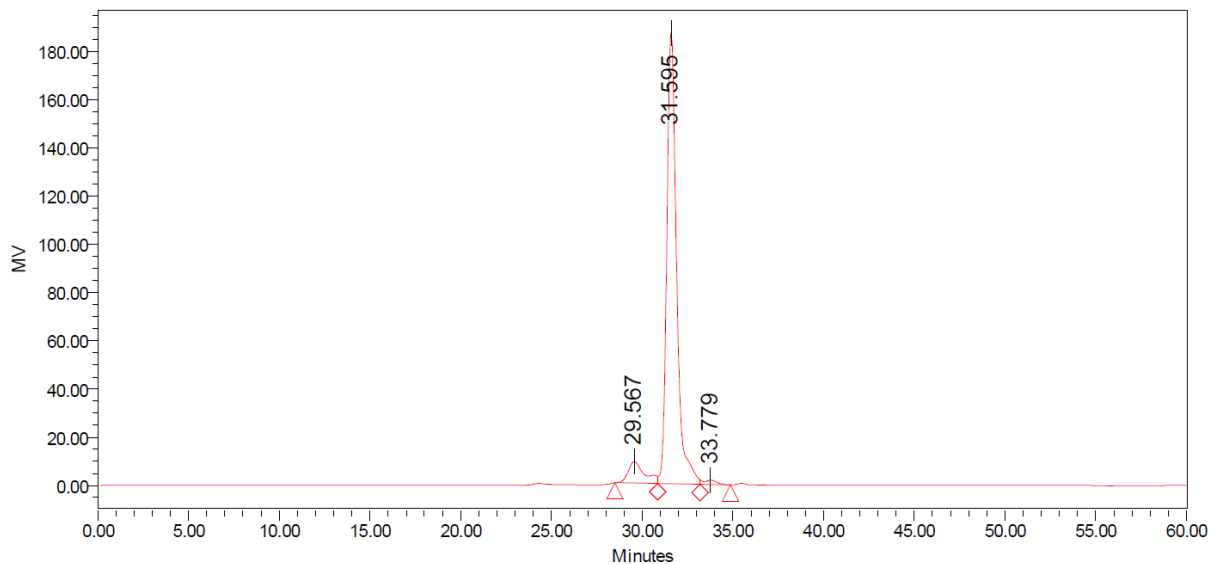
CAS: 34612-38-9
Molecular Formula: $C_{24}H_{42}O_{21}$
MW 666.6



PURITY: > 90% (HPLC)

HPLC:

Column: 2 x Tosoh TSK-GEL G2500 PWXL (7.8 x 300 mm) plus guard column (7.8 x 35mm).
 Temperature: 80°C
 Mobile phase: dH₂O
 Flow rate: 0.5 mL/min
 HPLC system: Waters Alliance e2695 Separations Module, Waters 2414 RI detector and Empower v 3 software



Processed Channel: 410

	Processed Channel	Retention Time (min)	Area	% Area	Height
1	410	29.567	558249	7.27	8942
2	410	31.595	7026179	91.53	187174
3	410	33.779	91692	1.19	1820

HPAEC-PAD:

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

Temperature: 30°C

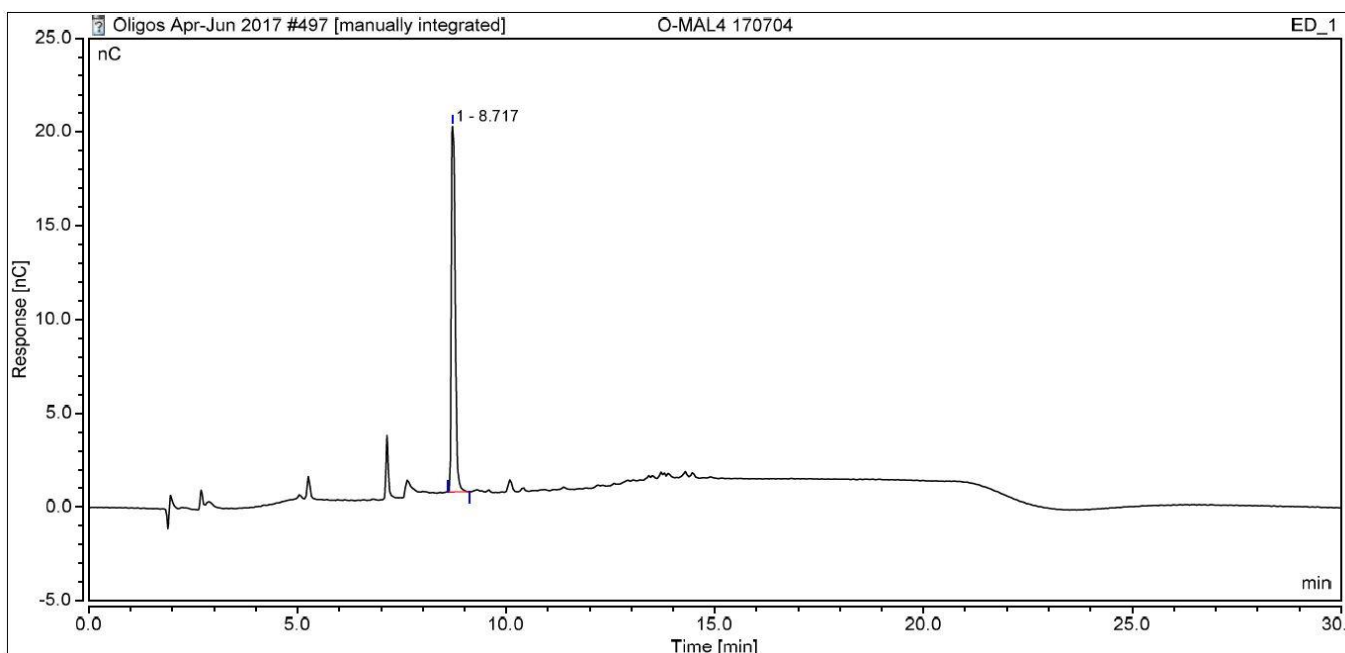
Detector: Au electrode; waveform Carbohydrate, standard quad

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 (%) in 100mM NaOH
0	100	0
5	55	45
9	30	70
10	0	100
18	0	100
19	100	0
30	100	0

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