

XYLOGLUCAN (TAMARIND) (Lot 150902)

P-XYGLN 06/18

CAS: 37294-28-3

PROPERTIES

Purity ~ 95% (on a moisture free basis).

Viscosity 13.2 dL/gram; (~ 142 cSt; 1% w/v, 30°C)

 Protein
 < 0.2%</td>

 Ash
 < 0.4%</td>

 Moisture
 2.7%

Physical Description Odourless, whiter powder.

Solubility Can be dissolved in hot water at a concentration of 10 mg/mL

by slowly adding the powder to vigorously stirring hot water. Stirring should be continued for at least 4 hours (at 50°C).

SUGAR COMPOSITION

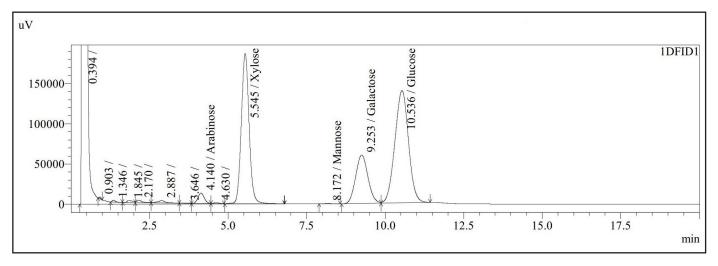
Xylose 34%
Glucose 45%
Galactose 17%
Arabinose 2%
Other sugars 2%

STORAGE CONDITIONS

Store dry at room temperature in a well sealed container.

Under these conditions, the product is stable for several years.

Gas liquid chromatography of the alditol acetates derived from hydrolysis and derivatisation of Xyloglucan (tamarind) (Lot 150902)



GLC

A typical polysaccharide sample (~ 10 mg) was hydrolysed using 2N TFA at 120°C for 60 min. Subsequent sodium borohydride reduction was performed in 1N NH₄OH for 90 minutes at 40°C. The corresponding alditol acetates were prepared using acetic anhydride and 1-methyl imidazole, extracted into DCM and analysed by GC. Chromatography was performed on a Shimadzu GC-14B with CHROMATOPACK C-R8A using a Packed glass column (6 ft x 5 mm OD, 3 mm ID) with 3% Silar 10C on W-HP (80-100 mesh). The carrier gas was nitrogen at 130 KPa. Injector temperature; 250°C; Column temperature; 230°C. Detection by FID with 60KPa H_2 pressure and 50 KPa air pressure.