Synthesis of the trisaccharide portion of soyasaponin βg : evaluation of a new glucuronic acid acceptor

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The synthesis of the trisaccharide portion of Soyasaponin βg was successfully achieved using a new glucuronic acid acceptor: methyl 1-O-allyl-3,4-di-O-methoxymethyl- β -D-glucuronate.

Enzymatic synthesis of 4-methylumbelliferyl (1 \rightarrow 3)- β -D-glucooligosaccharides—new substrates for β -1,3-1,4-D-glucanase

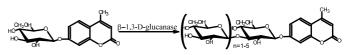
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Substrate specificity of the α-L-arabinofuranosidase from *Rhizomucor pusillus* HHT-1

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An effective process of natural L-arabinose production from lignocellulosic biomass by fungal α -L-arabinofuranosidase has been investigated.

β-Glycosylamidine as a ligand for affinity chromatography tailored to the glycon substrate specificity of β-glycosidases

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 β -Glycosylamidine was used as a ligand for affinity chromatography of β -glycosidases to effect one-step purification of β -glycosidases according to the glycon substrate specificity.

 $R^1 = OH, R^2 = H; R^1 = H, R^2 = OH$

Carbohydr. Res. 2003, 338, 1491

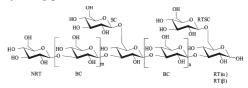
Structural characterization of $(1 \rightarrow 3)$ - β -D-glucans isolated from blastospore and hyphal forms of *Candida albicans*

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Positive and negative electrospray ionisation tandem mass spectrometry as a tool for structural characterisation of acid released oligosaccharides from olive pulp glucuronoxylans

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Xylo-oligosaccharides with degree of polymerisation 5–13, formed by partial acid hydrolysis from an extract of olive pulp GX, were analysed by ESI-MS, both in positive and negative modes. The analysis allows to infer a scatter and random distribution of MeGlcA along the xylan backbone, as proposed for olive seed hull and *Eucalyptus* wood xylo-oligosaccharides.

Effect of culture media on the chemical and physical characteristics of polysaccharides isolated from *Poria cocos* mycelia

Carbohydr. Res. 2003, 338, 1507

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Polysaccharide fractions were isolated from *Poria cocos* mycelia obtained with a wild strain cultured in two different media. The chemical structure and molecular mass of these polysaccharides were determined by GC, ¹³C NMR, light scattering, SEC and viscometry.

Antitumor activities of heteropolysaccharides of *Poria* cocos mycelia from different strains and culture media

Carbohydr. Res. 2003, 338, 1517

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The correlation of structure to bioactivity for 10 heteropolysaccharides isolated from different *Poria cocos* mycelia was investigated. Samples originating from the wild strain cultured in a corn medium exhibited high inhibition ratio against Sarcoma 180 tumor, ranging from 43 to 67%.

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Crystal structure of chartreusin derivative A132

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