

Carbohydrate Research Vol. 344, No. 8, 2009

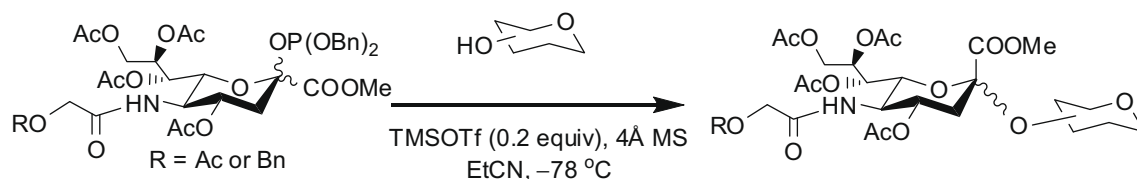
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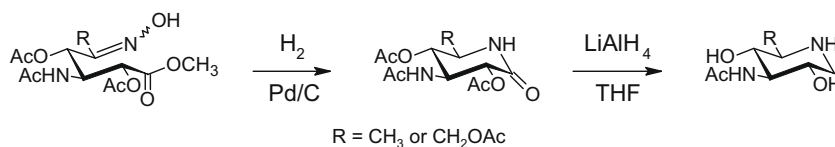
Shinya Hanashima, Taku Tomiya, Daichi Ishikawa, Shoji Akai, Ken-ichi Sato *



A stereocontrolled synthesis of 3-acetamido-1,3,5-trideoxy- and 1,3,5,6-tetradideoxy-1,5-imino-*D*-glucitol

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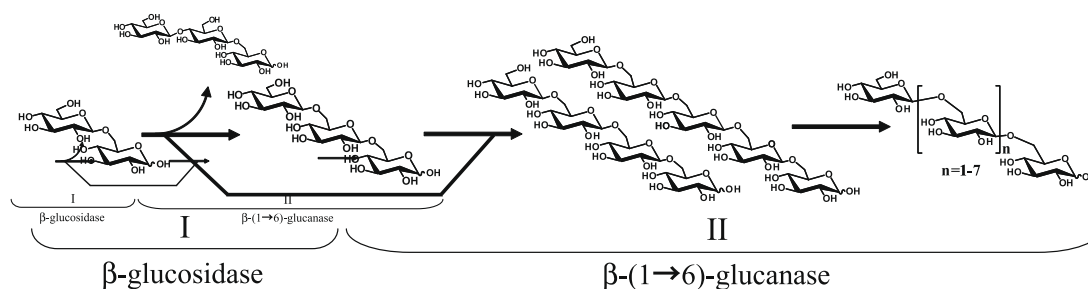
Ondřej Šimák *, Jan Staněk, Jitka Moravcová



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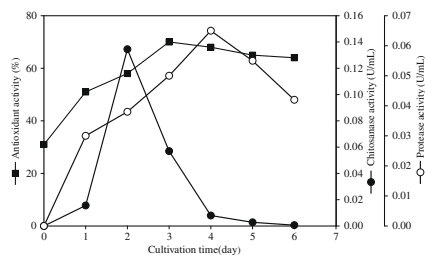
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Yoshinori Fujimoto, Takeshi Hattori, Shuji Uno, Takeomi Murata, Taichi Usui *



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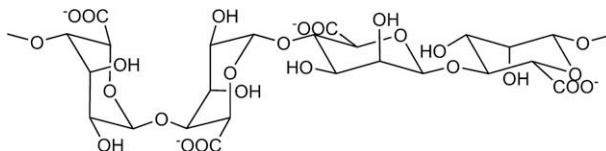
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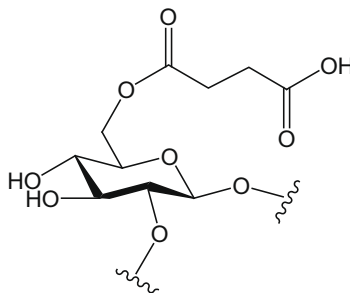
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Novel succinylated and large-sized osmoregulated periplasmic glucans of *Pseudomonas syringae* pv. *syringae*

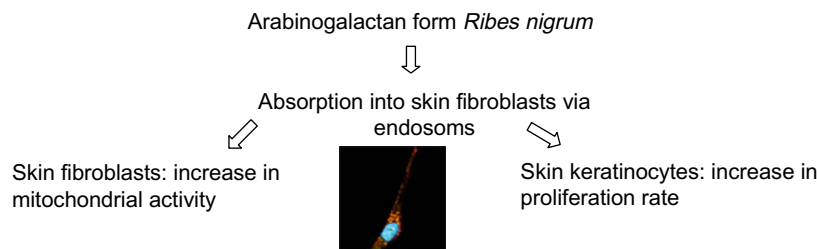
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Eunae Cho, Yukyoung Jeon, Seunho Jung ^{*}

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A high molecular arabinogalactan from *Ribes nigrum* L.: influence on cell physiology of human skin fibroblasts and keratinocytes and internalization into cells via endosomal transport

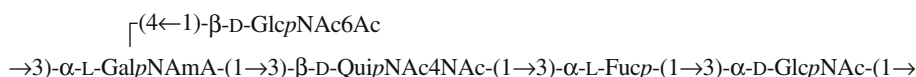
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Janina Zippel, Alexandra Deters, Dirk Pappai, Andreas Hensel ^{*}

Structure of a polysaccharide from the lipopolysaccharide of *Vibrio vulnificus* clinical isolate YJ016 containing 2-acetimidoylamino-2-deoxy-L-galacturonic acid

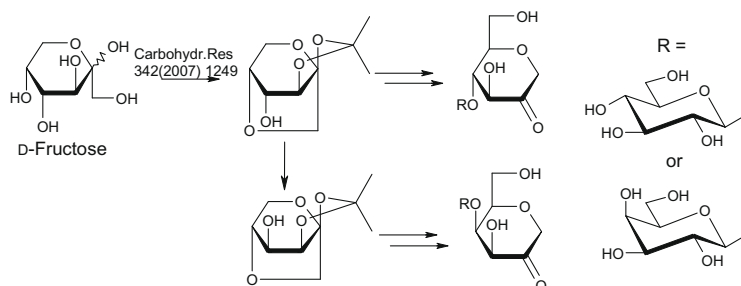
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**Notes**
Synthesis of 4-O-glycosylated 1,5-anhydro-D-fructose and of 1,5-anhydro-D-tagatose from a common intermediate 2,3-O-isopropylidene-D-fructose

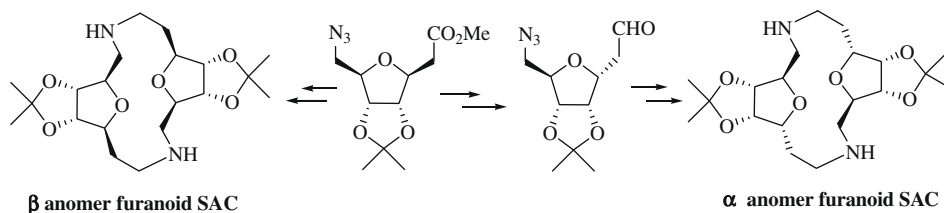
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Károly Agoston *, Gyula Dékány, Inge Lundt


Convenient approaches to synthesis of furanoid sugar-aza-crown ethers from C-ribosyl azido aldehyde via a reductive amination/amidation

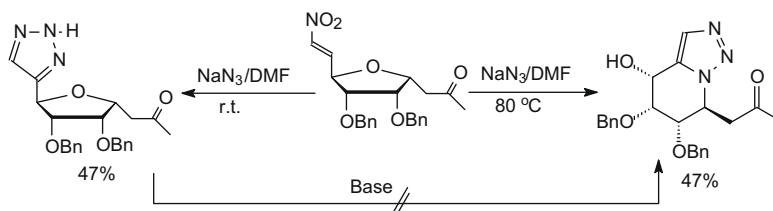
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Yu-Chi Hsieh, Jiun-Ly Chir, Wei Zou, Hsiu-Han Wu, An-Tai Wu *


Triazole-fused sugars from nitroalkene-containing C-glycosides by a tandem 1,3-dipolar cycloaddition and intramolecular Michael addition

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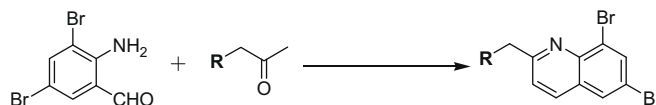
Wei Zou *, Milan Bhasin, Kannan Vembaiyan, Dean T. Williams



Facile one-pot synthesis of sugar–quinoline derivatives

pp 1028–1031

Subbiah Nagarajan, Thangamuthu Mohan Das *

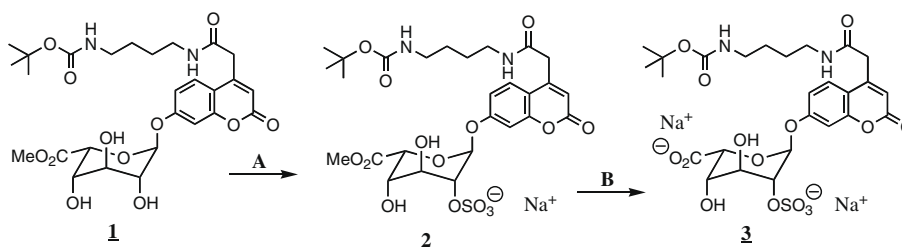


R = 4,6-O-butyldiene- β -D-glucopyranose; β -D-glucopyranose; β -D-xylopyranose; β -D-galactopyranose; 2,3,4,6-tetra-O-acetyl- β -D-glucopyranose; 2,3,4-tri-O-acetyl- β -D-xylopyranose; 2,3,4,6-tetra-O-acetyl- β -D-galactopyranose.

Short synthetic sequence for 2-sulfation of α -L-iduronate glycosides

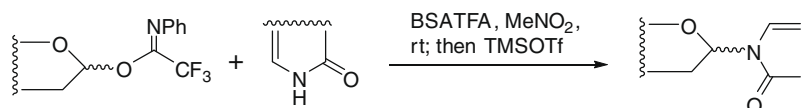
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Sophie Blanchard, Frantisek Turecek, Michael H. Gelb *

**An improved procedure for nucleoside synthesis using glycosyl trifluoroacetimidates as donors**

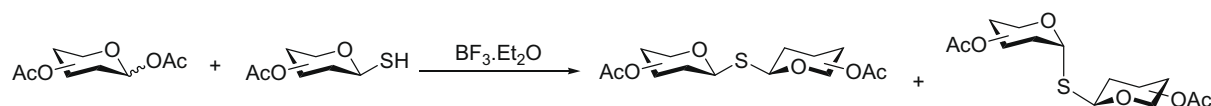
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Jinxi Liao, Jiansong Sun *, Biao Yu *

**A facile preparation of trehalose analogues: 1,1-thiodisaccharides**

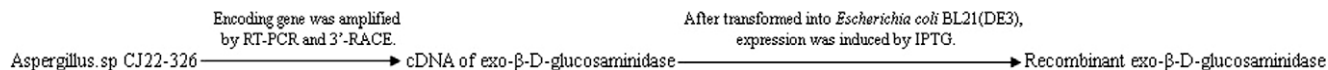
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Goreti Ribeiro Morais, Andrew J. Humphrey, Robert A. Falconer *



Expression, purification, and characterization of *exo*- β -D-glucosaminidase of *Aspergillus* sp. CJ22-326 from *Escherichia coli***pp 1046–1049**

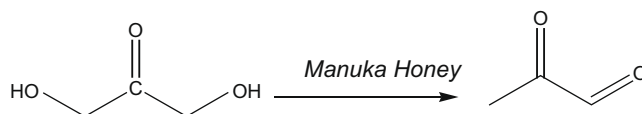
Songlin Li, Chen Wang, Wenshui Xia *



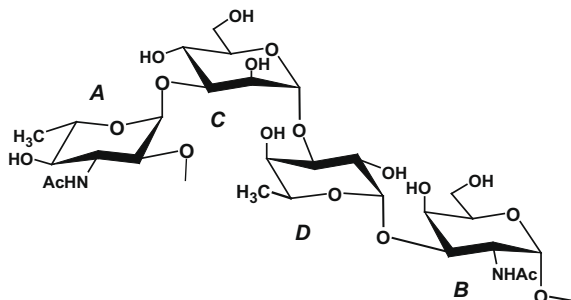
The cDNA encoding *exo*- β -D-glucosaminidase from *Aspergillus* sp. CJ22-326 was cloned, expressed and its product was purified from *Escherichia coli*. This is the first report on cloning of the gene encoding *Aspergillus* sp. *exo*- β -D-glucosaminidase.

The origin of methylglyoxal in New Zealand manuka (*Leptospermum scoparium*) honey**pp 1050–1053**

Christopher J. Adams, Merilyn Manley-Harris *, Peter C. Molan

**Structural determination of the O-antigenic polysaccharide from *Salmonella* Mara (O:39)****pp 1054–1057**

Jerzy Gajdus, Zbigniew Kaczyński *, Joanna Śmietana, Piotr Stepnowski



*Corresponding author

Supplementary data available via ScienceDirect

COVER

Shown is a fluorescence image of cell-surface glycans in a 3-day old zebrafish larva. Different colors represent glycans biosynthesized at different times in development. The glycans were imaged in live zebrafish using a two-step approach termed the bioorthogonal chemical reporter strategy. Embryos were first metabolically labeled with the unnatural monosaccharide *N*-azidoacetylgalactosamine, which targets the core position of mucin-type O-glycans; subsequently, the azide-containing glycans were reacted with a cyclooctyne–fluorophore conjugate by copper-free click chemistry, a step that was repeated multiple times to target temporally distinct glycan pools with different fluorophores. This work is the result of a collaboration between the Departments of Chemistry and Molecular and Cell Biology at the University of California, Berkeley [Laughlin, S. T.; Baskin, J. M.; Amacher, S. L.; Bertozzi, C. R. *Science* **2008**, 320, 664].

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