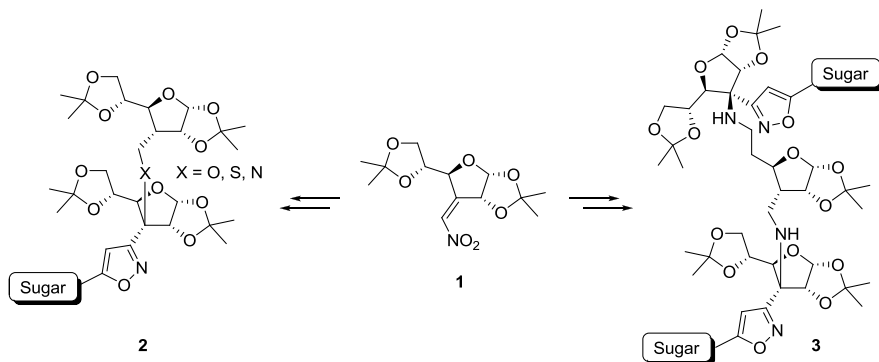


ISOXAZOLE-LINKED OLIGOSACCHARIDES

Jevgenija Lugiņina, Vitalijs Rjabovs, Māris Turks

Faculty of Material Science and Applied Chemistry, Riga Technical University,
14/24 Āzenes Str., Riga, LV-1007, Latvia,
maris_turks@ktf.rtu.lv

Modification of C(3) and C(5) position in glucose leads to discovery of new previously unknown conjugates. Here we report a novel approach for synthesis of sugar clusters which is based on Michael addition/1,3-dipolar cycloaddition reaction sequence. We have identified glucose-derived nitroalkene **1** as a suitable structural motif which is capable to link a molecule possessing nucleophilic center and a molecule possessing terminal alkyne.¹ Using different *O*-, *S*-, *N*- sugar nucleophiles it is possible to build carbohydrate cluster of type **2** and **3**.



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References:

1. Lugiņina, J.; Rjabovs, V.; Belyakov, S.; Turks, M. *Carbohydr. Res.* **2012**, *350*, 86.