

BESC - Method of Producing Butyric Acid from Sugars

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Technology Summary

A sustainable future will likely be dependent on large-scale production of fuels, chemicals, and products from renewable resources. One of the most promising approaches to this end is microbially-synthesized bioproducts from plant sugars. Bulk chemical such as butyric acid is a 4-carbon chain compound of industrial significance in food/feed, biofuels and pharmaceuticals. A newly discovered strain utilizes both hexose and pentose sugars for production of butyric acid. The butyrate yields are 0.41 g/g xylose (85% of maximum theoretical yield) and 0.30 g/g glucose (59 % of theoretical maximum) and 90% of the carbon is recovered in terms of useful industrial products.

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