

2-dehydro-3-deoxy-phosphogluconate/2-dehydro-3-deoxy-6-phosphogalactonate aldolase

Cat. No. EXWM-4892

Lot. No. (See product label)

Introduction

Description

In the archaeon *Sulfolobus solfataricus* the enzyme is involved in glucose and galactose catabolism via the branched variant of the Entner-Doudoroff pathway. It utilizes 2-dehydro-3-deoxy-6-phosphate-D-gluconate and 2-dehydro-3-deoxy-6-phosphate-D-galactonate with similar catalytic efficiency. In vitro the enzyme can also catalyse the cleavage of the non-phosphorylated forms 2-dehydro-3-deoxy-D-gluconate and 2-dehydro-3-deoxy-D-galactonate with much lower catalytic efficiency. cf. EC 4.1.2.21, 2-dehydro-3-deoxy-6-phosphogalactonate aldolase, and EC 4.1.2.14, 2-dehydro-3-deoxy-phosphogluconate aldolase.

Synonyms

2-keto-3-deoxygluconate aldolase (ambiguous); KDGA (ambiguous)

Product Information

Form

Liquid or lyophilized powder

EC Number

EC 4.1.2.55

Reaction

(1) 2-dehydro-3-deoxy-6-phospho-D-gluconate = pyruvate + D-glyceraldehyde 3-phosphate; (2) 2-dehydro-3-deoxy-6-phospho-D-galactonate = pyruvate + D-glyceraldehyde 3-phosphate

Notes

This item requires custom production and lead time is between 5-9 weeks. We can custom produce according to your specifications.

Storage and Shipping Information

Storage

Store it at +4 °C for short term. For long term storage, store it at -20 °C~-80 °C.