Creative Enzymes®

Native Bacillus stearothermophilus Phosphoglucose Isomerase

Cat. No. NATE-0553

Lot. No. (See product label)

Introduction

Description	Phosphoglucose Isomerase (PGI) is an enzyme crucial for the interconversion of D-glucose 6-phosphate and D-fructose 6-phosphate. PGI is responsible for the second step of glycolysis and is involved in glucogenesis. It is highly conserved in bacteria and eukaryotes.
Applications	Phosphoglucose Isomerase (PGI) is an enzyme crucial for the interconversion of D-glucose 6-phosphate and D-fructose 6-phosphate. PGI is responsible for the second step of glycolysis and is involved in glucogenesis. It is highly conserved in bacteria and eukaryotes. It is used in sugar assays to convert fructose to glucose. This product is from Bacillus stearothermophilus. The enzyme from Creative Enzymes has been used in the determination of fructose 6-phosphate in a mutant strain of Rhizobium meliloti.
Synonyms	Glucose-6-phosphate isomerase; EC 5.3.1.9; phosphohexose isomerase; phosphohexomutase; oxoisomerase; hexosephosphate isomerase; phosphosaccharomutase; phosphoglucoisomerase; phosphohexoisomerase; phosphoglucose isomerase; glucose phosphate isomerase; hexose phosphate isomerase; D-glucose-6-phosphate ketol-isomerase; 9001-41-6; PGI

Product Information

Source	Bacillus stearothermophilus
Form	lyophilized powder containing Tris buffer
EC Number	EC 5.3.1.9
CAS No.	9001-41-6
Activity	300-1,000 units/mg protein
Isoelectric point	4.2
pH Stability	42623
Optimum pH	42623
Unit Definition	One unit will convert 1.0 µmole of D-fructose 6-phosphate to D-glucose 6-phosphate per min at pH 9.0 at 30°C.

Storage and Shipping Information

Storage	−20°C