Creative Enzymes®

Fructose 1,6-bisphosphatase from Human, Recombinant

Cat. No. NATE-1576

Lot. No. (See product label)

Introduction

Description Fructose 1,6-bisphosphatase (FBPase; EC 3.1.3.11) is an enzyme in the liver that converts fructose-1,6-bisphosphate to fructose 6-phosphate in gluconeogenesis. Fructose bisphosphatase catalyses the reverse of the reaction which is catalysed by phosphofructokinase, which is involved in the process of glycolysis. These enzymes only catalyse the reaction in one direction each, and are regulated by metabolites such as fructose 2,6-bisphosphate so that high activity of one of the two enzymes is accompanied by low activity of the other. It is involved in many different metabolic pathways and found in most organisms. FBPase requires metal ions for catalysis (Mg2+ and Mn2+ being preferred) and the enzyme is potently inhibited by Li+.

Synonyms Fructose-bisphosphatase; EC 3.1.3.11; FBPase; Hexose diphosphatase

Product Information

Species Human

Source E. coli

Form Liquid. Storage Buffer: 50 mM potassium phosphate pH-7.4, 50 mM sodium chloride, 0.5 mM ethylenediaminetetraaceticacid, and 2.5% glycerol.

EC Number EC 3.1.3.11

Molecular Weight 36.8 kDa

Purity > 90% (densitometry)

Activity 1525 pmol/min/ug

Unit Definition One unit is defined as the amount of enzyme that will convert 1 nmol of NADP to NADPH at 30 °C.

Storage and Shipping Information

Storage Stable for > 6 months at -80°C