Creative Enzymes®

Inorganic Pyrophosphatase from Escherichia coli, Recombinant

Cat. No. NATE-0355

Lot. No. (See product label)

Introduction

Description Pyrophosphatase (or inorganic pyrophosphatase) is an enzyme (EC 3.6.1.1) that catalyzes the conversion of one molecule of pyrophosphate to two phosphate ions. This is a highly exergonic reaction, and therefore can be coupled to unfavorable biochemical transformations in order to drive these transformations to completion. The functionality of this enzyme plays a critical role in lipid metabolism (including lipid synthesis and degradation), calcium absorption and bone formation, and DNA synthesis,as well as other biochemical transformations.

Applications Inorganic pyrophosphatase (PPase) is a ubiquitous enzyme catalyzing the reaction PPi + H2O → 2Pi. It plays an important role in protein, RNA, and DNA synthesis.

Synonyms Pyrophosphate phosphohydrolase; inorganic pyrophosphatase; EC 3.6.1.1; 9024-82-2; iphosphate phosphohydrolase

Product Information

Species Escherichia coli

Source E. coli

Form Lyophilized powder in Tris-buffered salts containing protease inhibitors

EC Number EC 3.6.1.1

CAS No. 9024-82-2

Purity > 90%

Activity > 800 units/mg protein

Unit Definition One unit will release 1.0 μmole of inorganic orthophosphate per minute at pH 9 at 25°C.

Storage and Shipping Information

Storage −20°C