

Native Bovine Protein Phosphatase 2C

Cat. No. NATE-0619

Lot. No. (See product label)

Introduction

Description Protein Phosphatase 2C is a Mg²⁺-dependent serine/threonine protein phosphatase with a molecular mass of 42–45 kDa, involved in regulating numerous cellular processes. It is ubiquitously expressed and has been isolated from many mammalian tissues including liver, brain, skeletal muscle, retina, and blood platelets. There are two major isotypes associated with this enzyme, 2C1 and 2C2, also known as 2Ca and 2Cb, respectively. Both isozymes appear to be equally Mg²⁺-dependent and respond similarly to specific substrates. Both are monomers that demonstrate ~75% sequence homology. The molecular masses are similar; 44 kDa and 42 kDa for 2C1 and 2C2, respectively. Additional Type 2C serine/threonine protein phosphatases include 2Cg, 2Cd, Wip1, and NERPP2C, many of which have multiple isozyme members.

Synonyms Protein Phosphatase 2C; PP2C

Product Information

Species Bovine

Source Bovine kidney

Form buffered aqueous glycerol solution

Activity ~1000 units/mg protein

Buffer Solution in 50 mM Tris-HCl, pH 7.0, containing 14 mM 2-mercaptoethanol, 1 mM benzamidine, 0.1 mM PMSF, 1 mM EDTA, and 50% glycerol

Unit Definition One unit will release 1.0 nanomole of phosphate from 32P-labeled myelin basic protein at pH 7.0 at 30°C

Usage and Packaging

Package vial of 1 µg

Storage and Shipping Information

Stability –70°C