

## Native *Canavalia ensiformis* (Jack bean) $\alpha$ -Mannosidase

Cat. No. NATE-0754

Lot. No. (See product label)

### Introduction

**Description**  $\alpha$ -Mannosidase is an acid hydrolase which is located in plant vacuoles and is thought to be involved with the turnover of N-linked glycoproteins.  $\alpha$ -Mannosidase has been shown to inhibit the proliferation of B-lymphocytes.  $\alpha$ -Mannosidase from *Canavalia ensiformis* is a tetramer composed of two subunits that each contain two components at 44 and 66 kDa.

**Applications** Liberates mannose from a variety of synthetic and natural  $\alpha$ -mannosides.  $\alpha$ -Mannosidase can be used to liberate mannose from a variety of synthetic and natural  $\alpha$ -mannosides. It has also been used in a study to investigate the causes of neurodegeneration in mucopolipidosis II 'knock-in' mice.

**Synonyms**  $\alpha$ -mannosidase;  $\alpha$ -D-mannosidase; p-nitrophenyl- $\alpha$ -mannosidase;  $\alpha$ -D-mannopyranosidase; 1,2- $\alpha$ -mannosidase; 1,2- $\alpha$ -D-mannosidase; exo- $\alpha$ -mannosidase; EC 3.2.1.24; 9025-42-7; Mannosidase

### Product Information

**Source** *Canavalia ensiformis* (Jack bean)

**Form** ammonium sulfate suspension. Suspension in 3.0 M (NH<sub>4</sub>)<sub>2</sub>SO<sub>4</sub> and 0.1 mM zinc acetate, pH 7.5

**EC Number** EC 3.2.1.24

**CAS No.** 9025-42-7

**Activity** > 15 units/mg protein (biuret)

**Unit Definition** One unit will hydrolyze 1.0  $\mu$ mole of p-nitrophenyl  $\alpha$ -D-mannoside to p-nitrophenol and D-mannose per min at pH 4.5 at 25°C.

### Storage and Shipping Information

**Storage** 2-8°C