



## PRODUCT DATA SHEET

**Product:** Caspase-1 Enzyme, human

**Cat. No:** BC-116 (25 U)  
BC-117 (100 U)

**Description:**

Caspase-1 (also known as ICE, Interleulin-1 $\beta$ -Converting Enzyme) is the prototypical member of the caspase family of cysteine proteases. Caspase-1 exists in cells as an inactive 45 kDa pro-enzyme. The pro-enzyme is matured by proteolysis to yield large (20 kDa) and small (10 kDa) subunits. The active enzyme is a heterotetramer consisting of two large and two small subunits. To date the mechanism of regulation of caspase-1 activation is complex and poorly understood. In THP-1 cells, a large proportion of the caspase-1 is present in the inactive pro-enzyme form.

**Origin:** Produced in bacteria.

**Format:** Lyophilized powder.

**Reconstitution:**

Reconstitute with PBS to 1 unit/ $\mu$ l.

**Specific Activity:**

~8000 units/mg. One unit cleaves 1 nmol of the caspase substrate YVAD-pNA per hour at 37°C in a reaction solution containing 50 mM HEPES, pH 7.2, 50 mM NaCl, 0.1% CHAPS, 10mM EDTA, 5% glycerol and 10 mM DTT.

**Storage and Stability:**

Store at -80°C. Avoid freeze / thaw cycles. After reconstitution, prepare aliquots and store at -80°C.

**Limitations:**

For *in vitro* research use only. Not for use in diagnostics or in humans.

**Warranty:**

No warranties, expressed or implied, are made regarding the use of this product. KAMIYA BIOMEDICAL COMPANY is not liable for any damage, personal injury, or economic loss caused by this product.