

## CERTIFICATE OF ANALYSIS

### Turbocharged Protease + Phosphatase Inhibitor Cocktail, EDTA-Free

T-2496

Lot# L1290

Lyophilized Solid

1 Vial

This broad spectrum Protease and Phosphatase Inhibitor cocktail has been specifically designed to provide complete protection of valuable proteins of interest from degradation during extraction and purification.

**Features and Benefits:** Complete protection from proteases and phosphatases in one single cocktail. All our cocktails contain AEBSF, the preferred serine protease inhibitor, to provide superior protection with unmatched stability, convenience and reliability. The cocktail formulations are available with or without EDTA which may interfere with protein stability or certain downstream applications. Our cocktails are lyophilized solids which dissolve instantaneously making them readily available for their instantaneous inhibitory action and are easier to use than tablets that require splitting, vortexing and time consuming dissolution. Our lyophilized solids are guaranteed for stability, reproducibility and have a shelf life of over a year. Most other commercially available cocktails made and sold in aqueous solutions offer very low guarantee of stability after 1 month of being manufactured (Lit ref: Bestatin, Leupeptin solution in water are stable for 1 month at -20°C). Economical: More cost effective than other commercially available formulations. Reliable: Count on our expertise in the production of high quality cocktails that have been successfully used for 20 + years by thousands of researchers worldwide.

**Product Description:** White Lyophilized Solid. The cocktail contains 16 inhibitors targeting against the major classes of proteases and phosphatases as outlined in the following table

Products	Target Proteases	Products	Target Phosphatases
AEBSF, HCl	Serine Proteases	Imidazole	Alkaline Phosphatases
Aprotinin	Broad Spectrum, Serine Proteases	Sodium Orthovanadate	Protein Tyrosine Phosphatase, Alkaline Phosphatase
Bestatin	Aminopeptidase B and Leucine Aminopeptidase	Sodium Molybdate	Acid and Phosphoprotein Phosphatases
E-64	Cysteine Proteases	NaF	Acid Phosphatases
Leupeptin	Cysteine Proteases and Trypsin-like Proteases	Sodium Pyrophosphate	PPI and PP2A
Pepstatin A	Aspartic Proteases	Glycerophosphate	Ser/Thr Phosphatases
Phosphoramidon	Metalloproteases Metalloendopeptidases	Na Tartrate Dillydrate	Acid Phosphatases
Antipain	Papain, Cathepsin A/B	Bromotetramisole oxalate	Alkaline Phosphatases

**Recommended Usage:** This cocktail has been optimized for effectiveness, convenience, stability, reproducibility and has been tested for general use. It inhibits activity in extracts from almost any tissue or cell types including animals, plants, yeasts, bacteria and fungi.

Reconstitute each vial with 1 ml of water to obtain a concentrated stock solution. Dilute this cone stock solution to 1X before use.

Recommended dilution is 1:100 (based on the application). One vial is recommended for 10g-20g of tissue or cell extract.

**Solubility:** Soluble in water, aqueous buffers or add directly to extraction media.

**Storage / Stability:** Freezer (-20°C). Hygroscopic. Following reconstitution, aliquot and freeze (-20°C). Stock solutions are stable for up to 1 month at -20°C. **EXPIRES:** August 2023

References: Proteolytic Enzymes- A Practical Approach (Beynon, P. J. & Bond, J. S. eds) 1994, pp. 241-249.

**Related Products:**

Turbocharged Protease Inhibitor Cocktail (T-2492) / Turbocharged Protease Inhibitor Cocktail, EDTA-Free (T-2493)

Turbocharged Phosphatase Inhibitor Cocktail (T-2494)

Turbocharged Protease + Phosphatase Inhibitor Cocktail (T-2495)

Turbocharged Protease + Phosphatase Inhibitor Cocktail, EDTA-Free (T-2496)

INHIBITOR COCKTAILS	Cat.No	Components	Recommended Applications
Protease Inhibitor Cocktail I	P-1510	AEBSF, Aprotinin, E-64, EDTA, Leupeptin	General Use
Protease Inhibitor Cocktail I, Animal-Free	P-1540	AEBSF, Aprotinin(Recombinant), E-64, EDTA, Leupeptin	General use and for applications that require animal-free reagents
Protease Inhibitor Cocktail II	P-1511	AEBSF, Bestatin, E-64, EDTA, Pepstatin A	Bacterial cell extracts
Protease Inhibitor Cocktail III	P-1512	AEBSF, Aprotinin, Bestatin, E-64, Leupeptin, Pepstatin A	Mammalian cells and tissue extracts
Protease Inhibitor Cocktail III, Animal-Free	P-1542	AEBSF, Aprotinin(Recombinant) Bestatin, E-64, Leupeptin, Pepstatin A	Mammalian cells and tissue extracts and for applications that require animal-free reagents
Protease Inhibitor Cocktail III, Animal-Free, DMSO-Free	P-1543	AEBSF, Aprotinin(Recombinant) Bestatin, E-64, Leupeptin, Pepstatin A	Mammalian cells and tissue extracts, for animal-free, organic solvent free applications
Protease Inhibitor Cocktail IV	P-1513	AEBSF, E-64, Pepstatin A, Phenanthroline	Fungal and yeast cell extracts
Protease Inhibitor Cocktail V, EDTA-Free	P-1514	AEBSF, Aprotinin, E-64, Leupeptin	Mammalian cells and tissue extracts, samples analyzed by 2-D gel electrophoresis
Protease Inhibitor Cocktail V, EDTA-Free, Animal-Free	P-1544	AEBSF, Aprotinin(Recombinant), E-64, Leupeptin	Mammalian cells and tissue extracts and for applications that require animal-free reagents
Protease Inhibitor Cocktail VI, General Use	P-1515	AEBSF, Aprotinin, Bestatin, E-64, EDT A, Leupeptin	General Use
Protease Inhibitor Cocktail VI, Plant Cells	P-1545	AEBSF, Bestatin, E-64, Leupeptin, Phenanthroline, Pepstatin A	Plant cell extracts
Protease Inhibitor Cocktail VII	P-1546	AEBSF, Bestatin, E-64, Pepstatin A, Phosphoramidon	Histidine-tagged proteins
Protease Inhibitor Cocktail VII, DMSO-Free	P-1547	AEBSF, Bestatin, E-64, Pepstatin A, Phosphoramidon	Histidine-tagged proteins and for organic solvent free applications
Protease Inhibitor Cocktail VIII	P-1548	ALLN, Antipain, E-64	Broad range cysteine protease inhibition
Serine Protease Inhibitor Cocktail I	P-1516	AEBSF, Aprotinin, Elastatinal, GGACK	Broad range serine protease inhibition
Phosphatase Inhibitor Cocktail I	P-1517	Bromotetramisole, Cantharidin, Microcystin LR	Animal tissues, A431 or Jurkat cell extracts
Phosphatase Inhibitor Cocktail II	P-1518	Imidazole, Na(Orthovanadate, Fluoride, Tartrate, Molybdate)	Animal tissues, A431 or Jurkat cell extracts
Phosphatase Inhibitor Cocktail III	P-1549	Na(Orthovanadate, Fluoride, Pyrophosphate)	Animal tissue extracts
Phosphatase Inhibitor Cocktail IV	P-1550	Bromotetramisole, Cantharidin, Calyculin A	Animal tissue extracts

#### Related Products: Protein Solubilizers.

Highly purified, Sterile, 10% aqueous solution of detergents. Aseptically manufactured.

**Sterile! No more mold growth in your detergents.**

Aldehyde & Peroxide Cone	<0.1 mM
Conductivity	<5 uMhos
Sterility	USP Grade

Products	Cat. No.	Pkg. Size
Protein Solubilizer X-114, Sterile 10% Triton X-114 Ampules	P-1496	10X5ml
Protein Solubilizer 80, Sterile 10% Tween 80 Ampules	P-1498	10X5ml
Protein Solubilizer X-100, Sterile 10% Triton X-100 Ampules	P-1500	10X5ml
Protein Solubilizer 20, Sterile 10% Tween 20 Ampules	P-1502	10X5ml
Protein Solubilizer 35, Sterile 10% Brij-35 Ampules	P-1504	10X5ml
Protein Solubilizer 40, Sterile 10% NP-40 Ampules	P-1505	10X5ml

Product Manufactured by:

**BioProcessing Biochemicals, Inc.** California, USA.