

# KPL ABTS<sup>®</sup> Peroxidase Substrate System (2-Component)

<u>Catalog No.</u>	<u>Size</u>
5120-0032 (50-62-00)	6 x 100 mL
5120-0033 (50-62-01)	6 x 450 mL

## DESCRIPTION

This 2 component liquid substrate system develops a blue-green product when reacted with peroxidase labeled conjugates in microwell plates. It is not recommended for membrane or immunohistochemical staining assays.

## FORM

Catalog No. 5120-0032 (50-62-00) consists of:  
3 x 100 mL KPL ABTS Peroxidase Substrate Solution A (Catalog No. 5120-0034 (50-64-00))  
3 x 100 mL KPL Peroxidase Substrate Solution B (Catalog No. 5120-0037 (50-65-00))

Catalog No. 5120-0033 (50-62-01) consists of:  
3 x 450 mL KPL ABTS Peroxidase Substrate Solution A (Catalog No. 5120-0035 (50-64-02))  
3 x 450 mL KPL Peroxidase Substrate Solution B (Catalog No. 5120-0038 (50-65-02))

## CONTENT

The KPL ABTS Peroxidase Substrate System (2-Component) contains 2,2'-azino-di-(3-ethylbenzthiazoline-6-sulfonate) at a concentration of 0.3 g/L in a glycine/citric acid buffer. KPL Peroxidase Substrate Solution B contains H<sub>2</sub>O<sub>2</sub> at a concentration of 0.02% in a proprietary buffer.

## STORAGE/STABILITY

Store at 2-8 °C. Stable for a minimum of 1 year when stored at 2-8 °C.

## USE

**PREPARATION:** Mix equal volumes of ABTS Peroxidase Substrate Solution A and Peroxidase Substrate Solution B. Warm to room temperature before use.

**SUBSTRATE DEVELOPMENT:** Following incubation with peroxidase labeled conjugate, wash plate thoroughly. Add 100 µL prepared substrate solution to each well. As the color develops, tap gently to mix. Incubation times will vary depending on your assay.

**TO STOP REACTION:** Stop reaction by adding an equal volume of ABTS Peroxidase Stop Solution

(See RELATED PRODUCTS) or 1% sodium dodecyl sulfate (SDS) to the microwell plate. This will halt color development. ABTS substrate will remain blue-green after addition of stop solution.

**TO READ REACTION:** Read at a wavelength between 405 - 410 nm. Stopped reaction should be read within 30 minutes.

**WHEN TO STOP SUBSTRATE REACTION:** The point at which the substrate reaction is stopped is often determined by the ELISA reader. The OD values of the plate should be monitored and the reaction stopped before positive wells are no longer recordable.

**TO REDUCE SUBSTRATE INTENSITY:** Background is a sign of over-reaction with ABTS. To reduce the intensity of the substrate reaction, further dilution of the primary antibody and/or conjugate is recommended. Dilution of the substrate is not recommended.

## ABSORBANCE MEASUREMENTS

### KINETIC ASSAYS:

ABTS substrate produces a blue-green color upon reaction with peroxidase. Read at a wavelength between 405 - 410 nm.

### ENDPOINT ASSAYS:

The addition of 100 µL (or an equal volume) of stop solution to the microwell plate will halt color development. Read at a wavelength between 405 - 410 nm. Stopped reactions should be read within 30 minutes.

## RELATED PRODUCTS

	<b>Cat No.</b>
ABTS Peroxidase Stop Solution	5150-0017 (50-85-01)
Wash Solution Concentrate	5150-0008 (50-63-00)
10% BSA Diluent/Blocking Solution Concentrate	5140-0006 (50-61-00)
Coating Solution Concentrate	5150-0014 (50-84-00)

## PRODUCT SAFETY AND HANDLING

See SDS (Safety Data Sheet) for this product.

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