

## Alkaline Phosphatase Enhancer

Catalog Number: K 011

Document #: DS-2016-A

Effective Date: 2/1/2015

### Intended Use

For In Vitro Diagnostic Use.

### Product Description

This product is used as a signal enhancer in conjunction with alkaline phosphatase based immunostaining systems.

### Summary and Explanation

Alkaline Phosphatase, an enzyme derived from bovine intestinal mucosa, is often used as a label for in situ hybridization, immunohistochemistry, Southern and Northern hybridization and DNA sequencing. Detection of this enzyme requires the generation of an insoluble colored reaction end product. Stronger the signal, better the staining. DBS introduces a new stable solution to increase the signal generated by alkaline phosphatase several fold. A single treatment of tissue sections with enhancer before the treatment with substrate/chromogen enables the visualization of difficult to localize antigens. This enhancer works well with Fast Red but can be used with BCIP/NBT and BCIP/INT also. Specimens stained with the above substrates/chromogens can not be dehydrated in ethanol and hence should be mounted in aqueous based mounting medium like C/C Mount (DBS catalog # K002).

### Format

Clear ready to use solution

### Volume/UOM

250 mL

### Storage and Handling

Store at room temperature. This product contains Sodium Azide as a preservative. Do not use after expiration date printed on label.

### Preparation of Working Solutions

1. Alkaline Phosphatase Enhancer is ready to use and does not require any preparation.

### Protocol Recommendations

1. Once tissue sections have been incubated with Streptavidin-Alkaline Phosphatase, wash thoroughly with wash buffer.
2. Wipe the slide(s) to remove excess wash buffer and add enough drops of Alkaline Phosphatase Enhancer to cover the tissue sections.
3. Alternately, pour Alkaline Phosphatase Enhancer in a coplin jar and soak the slide(s).
4. Incubate for 1 minute at room temperature.
5. Drain excess Alkaline Phosphatase Enhancer and add substrate/chromogen on the tissue sections without any wash between the two steps.

### Quality Control

Refer to CLSI Quality Standards for Design and Implementation of Immunohistochemistry Assays: Approved Guideline-Second edition (I/LA28-

### Troubleshooting

Contact Diagnostic BioSystems Technical Support at (925) 484-3350, extension 2, techsupport@dbiosys.com or your local distributor to report unusual staining results.

### Warranty

There are no warranties, expressed or implied, which extend beyond this description. Diagnostic BioSystems is not liable for property damage, personal injury, or economic loss caused by this product.

### Performance Characteristics

The protocols for a specific application can vary. These include, but are not limited to: fixation, heat-retrieval method, incubation times, tissue section thickness and detection kit used. Due to the superior sensitivity of these unique reagents, the recommended incubation times and titers listed are not applicable to other detection systems, as results may vary. The data sheet recommendations and protocols are based on exclusive use of Diagnostic BioSystems products. Ultimately, it is the responsibility of the investigator to determine optimal conditions. These products are tools that can be used for interpretation of morphological findings in conjunction with other diagnostic tests and pertinent clinical data by a qualified pathologist.

### Precautions

1. Wear disposable gloves when handling reagents.
2. Specimens, before and after fixation, and all materials exposed to them should be handled as if capable of transmitting infection and disposed of with proper precautions. Never pipette reagents by mouth and avoid contacting the skin and mucous membranes with reagents and specimens. If reagents or specimens come in contact with sensitive areas, wash with copious amounts of water.
3. Microbial contamination of reagents may result in an increase in nonspecific staining.
4. Incubation times or temperatures other than those specified may give erroneous results. The user must validate any such change.
5. Do not use reagent after the expiration date printed on the label.
6. The MSDS is available upon request.
7. Consult OSHA, federal, state or local regulations for disposal of any toxic substances.