

# Bio-Efface



Absolute Health

## Clinical Applications

- Helps Disrupt Gastrointestinal Biofilm \*
- Supports Degradation of Yeast Cell Walls \*
- Helps Protect Sensitive GI Tissues From Irritation\*
- Compliments Detoxification Protocols\*

*Bio-Efface is a specially formulated enzyme mixture is designed to support a healthy balance of intestinal microflora by helping to disrupt protective "biofilms" formed by undesirable microorganisms. Biofilms are complex groupings of microorganisms encased by a self-generated matrix of polysaccharides, proteins, water, metals, and debris. Microorganisms do not normally live independently of one another, but rather prefer life within an enclosed, protected biofilm community. Familiar biofilms found in the mouth include dental plaque and the film covering the oral cavity on awakening each morning. Biofilms are present in the stomach, small intestines, and colon.*

All Absolute Health Formulas Meet or Exceed cGMP Quality Standards

## Discussion

Microorganisms prefer to live in biofilms to increase their chances for survival and reproduction. Biofilms allow bacteria and yeast to develop and persist in favorable reproductive environments by conferring significant protection from predators, phagocytosis (a mechanism that the body uses to remove foreign substances), and other immune responses. Biofilms also provide a physical barrier to antimicrobial agents thus making pathogenic microorganisms highly resistant to antibiotics and extremely difficult to eradicate. As a result, pathogens and other harmful microbes that reside in the gastrointestinal tract can predominate over "friendly" bacteria which may compromise normal gastrointestinal and immune function.

**Helps Disrupt Gastrointestinal Biofilm** Specialized enzymes in this product help break down the components that form biofilm. Polysaccharides (such as cellulose) are very common constituents of the type of biofilm produced by a wide array of pathogens. This product provides polysaccharide-specific enzymes that help break these constituents down as well as protein- and peptide-specific enzymes that also aid in the disruption of biofilm.

**Supports Degradation of Yeast Cell Walls** Beta-glucans are polysaccharides that can comprise up to 60% of the cell wall of fungal organisms like *Candida albicans*. Another type of polysaccharide called chitosan can also be found in the cell walls of various fungi. To help disrupt the cell walls of yeast and other fungal organisms, this product includes several enzymes that target and break down or lyse these specific components. Lysozyme, an enzyme found in tears, saliva, and breast milk, is also included for its unique lysing action on bacterial and yeast cell walls.

**Helps Protect Sensitive GI Tissues From Irritation** Inflammation of gastrointestinal tissues can result from a variety of factors including toxins produced by intestinal pathogens. This product includes the enzyme *Serratia* peptidase to help protect sensitive gastrointestinal tissue from irritation and inflammation that can adversely affect tissue health and intestinal comfort. Research shows *Serratia* peptidase significantly degrades biofilm and favorably modulates immune responses.

**Compliments Detoxification Protocols** This product is intended to be used with other efforts to help rebalance gastrointestinal microflora. By assisting degradation of biofilm communities that may harbor potentially pathogenic bacteria and yeast, this product can serve as an important dietary adjunct for detoxification agents such as broad-spectrum antibiotics, anti-fungal/anti-parasitic medications or naturally occurring antimicrobials. This product may be especially appropriate for individuals with a history of prolonged antibiotic use or an imbalance in the ratio of beneficial organisms compared to pathogenic organisms such as *Escherichia coli*, *Candida albicans*, *Klebsiella pneumoniae*, and *Staphylococcus aureus*.

This enzyme supplement contains highly purified, filtered enzymes and is free of the following common allergens: milk/casein, fish, shellfish, peanuts, wheat/gluten, and soybeans. NOTE: Lysozyme in this product is derived from egg white. Although this is a highly purified material, individuals with known egg white allergy should consult their physician before using this product.

\*These statements have not been evaluated by the Food and Drug Administration.  
This product is not intended to diagnose, treat, cure, or prevent any disease.

DRS:200  
REV:11/3/2021

Manufactured for: Absolute Health  
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**Bio-Efface**



Serving Size 1 Capsule	
Amount Per Capsule	% Daily Value
Proprietary Enzyme Blend	425 mg *
Providing the following active enzymes:	
Polysaccharide Specific Enzymes	
Glucoamylase (with isomaltase side chain activity)	
Chitosanase	
Cellulase	
Hemicellulase (xyylanase) and Pectinase Complex	
Beta-Glucanase	
Protein and Peptide Specific Enzymes	
Protease/Peptidase Complex with endopeptidase, exopeptidase, and DPP-IV activity	
Other Enzymes	
Lysozyme (from egg white)	
Serratia peptidase (enteric-coated) <sup>†</sup>	
* Daily value not established	

Other ingredients: Vegetarian capsule (hydroxypropyl methyl-cellulose, water), coconut oil powder, and microcrystalline cellulose.  
 \*\*Patent Pending, ProThera®, Inc.  
 \*\*\*Peptizyme SP®, a registered trademark of Specialty Enzymes

## Directions

1 to 4 capsules daily depending on age and size or as directed by a healthcare practitioner. The capsules should be taken away from meals to maximize the enzyme effects. This product is best taken concurrently with an antimicrobial agent and in conjunction with probiotic and prebiotic supplements. The probiotic and prebiotic should be consumed at least 1 hour before or 2 hours after the use of this product.

## Does Not Contain

Gluten, yeast, artificial colors, or flavorings.

## Cautions

If you are pregnant, nursing, have a medical condition, taking prescription drugs, or are allergic to eggs, consult your physician before using this product. KEEP OUT OF REACH OF CHILDREN.



## References

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