

# Zymex® II

## Contains Important Digestive Enzymes to Support Healthy Gastrointestinal Function

The word “enzyme” comes from Greek words that mean *in yeast*. Enzymes were given this name when they were discovered while scientists were studying the process of fermentation.

Enzymes help sustain life. Almost every chemical reaction that takes place in all living cells of plants, animals, humans, and even of some bacteria begins by the stimulation of some specific enzyme. Enzymes are catalysts, meaning they speed up chemical reactions without changing themselves. They are the catalysts that set off multitudes of specific activities and processes throughout the human body. While hundreds of different enzymes have been discovered to date, each enzyme performs a singular function. Although the enzymes are each responsible for initiating a process that only that particular enzyme can accomplish, they are related to one another enough to allow classification into one of six categories. The proteolytic enzymes, for example, work to break down proteins in the digestive tract.

## How Zymex II Keeps You Healthy

### *Promotes healthy digestive function*

As food is taken into the mouth and begins its journey down the alimentary tract, it is met by a series of different enzymes. Each is responsible to initiate a different chemical reaction in the digestive process and each is dependent upon a certain acid or alkaline environment in order to perform its respective function. The human body requires adequate amounts of these digestive enzymes in order to break down ingested nutrients into substances suitable for absorption. The proteolytic enzymes work in the digestive system and at the cellular level to help digest proteins. Zymex II contains the proteolytic enzymes papain and bromelain, which are historically isolated from papaya and pineapple, respectively. In addition to proteolytic enzymes, Zymex II also contains amylase, another hydrolytic enzyme that triggers the process of breaking down starch into smaller carbohydrate molecules. Zymex II also contains lipase, an enzyme produced by organs of the digestive system to stimulate the breakdown of lipids.<sup>†</sup>

### *Provides alkaline-based digestive support for the acid-sensitive individual*

All enzymes, whether of the proteolytic variety or not, are extremely sensitive to acid and alkaline surroundings. Zymex II contains bromelain and papain. Both enjoy an optimum pH value of between 6 and 7.5 and remain stable in temperatures of up to 60° and 80° C. These characteristics offer the acid-sensitive individual digestive support without adding acid to the body.<sup>†</sup>

*Please copy for your patients.*

**GF** This product contains less than 10 parts per million of gluten per serving size or less than 20 parts per million per the suggested use listed on each product label.

<sup>†</sup>These statements have not been evaluated by the Food & Drug Administration. These products are not intended to diagnose, treat, cure, or prevent any disease.



Introduced in 1958



#### **Content:**

40 capsules

150 capsules

**Suggested Use:** Two capsules between meals, twice daily, or as directed.

#### **Supplement Facts:**

Serving Size: 2 capsules

Servings per Container: 20 or 75

	Amount per Serving	%DV
Calories	4	
Total Carbohydrate	1 g	<1%*

\*Percent Daily Values (DV) are based on a 2,000-calorie diet.

#### **Proprietary Blend:** 884 mg

Defatted almond (nut), fig (fruit), papain, bromelain, amylase, lipase, and cellulase.

Other Ingredients: Gelatin, water, maltodextrin, and colors.

**Sold through health care professionals.**



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# Zymex<sup>®</sup> II

## What Makes Zymex II Unique

### Product Attributes

#### Contains proteolytic enzymes and synergists

- › Papain and bromelain supported by other enzymes like amylase and lipase, as well as the whole food synergists almond and fig

#### Does not contain pancreatin or betaine hydrochloride

- › Developed for the acid-sensitive individual†

### Manufacturing and Quality-Control Processes

#### Not disassociated into isolated components

- › The nutrients in Zymex II are processed to remain intact, complete nutritional compounds

#### Degreed microbiologists and chemists in our on-site laboratories continually conduct bacterial and analytical tests on raw materials, product batches, and finished products

- › Ensures consistent quality and safety

#### Vitamin and mineral analyses validate product content and specifications

- › Assures high-quality essential nutrients are delivered

### Whole Food Philosophy

Our founder, Dr. Royal Lee, challenged common scientific beliefs by choosing a holistic approach of providing nutrients through whole foods. His goal was to provide nutrients as they are found in nature—in a whole food state where he believed their natural potency and efficacy would be realized. Dr. Lee believed that when nutrients remain intact and are not split from their natural associated synergists—known and unknown—bioactivity is markedly enhanced over isolated nutrients. Following this philosophy, even a small amount of a whole food concentrate will offer enhanced nutritional support, compared to an isolated or fractionated vitamin. Therefore, one should examine the source of nutrients rather than looking at the quantities of individual nutrients on product labels.

Studies on nutrients generally use large doses and these studies, some of which are cited below, are the basis for much of the information we provide you in this publication about whole food ingredients. See the supplement facts for Zymex<sup>®</sup> II.

Anderson L.E. 1998. *Mostly's Medical, Nursing, & Allied Health Dictionary*. 5th ed. St. Louis, MO: Mosby; 80, 946.  
Balch J.F., Balch P.A. 1997. *Prescription for Nutritional Healing*. 2nd ed. Garden City Park, NY: Avery Publishing Group; 87, 108-109, 341, 354, 361.  
Canaan S., et al. 1999. Gastric lipase: crystal structure and activity. *Biochemical Biophysical Acta* 1441(2-3): 197-204.  
Clemetson C.A., et al. 1978. Estrogens in food: the almond mystery. *International Journal of Gynaecology and Obstetrics* 15(6): 515-521.  
Han W.G., et al. 1999. QM/MM study of the active site of free papain and of the NMA-papain complex. *Journal of Biomolecular Structural Dynamics* 16(5): 1019-1032.  
Henderson T.R., et al. 1998. Effect of pasteurization on long chain polyunsaturated fatty acid levels and enzyme activities of human milk. *Journal of Pediatrics* 132(5): 876-878.  
Luz S., et al. 1997. Current concepts of digestion and absorption of carbohydrates. *Arg Gastroenterol* 34(3): 175-185.  
Monograph: Bromelain. *Alternative Medicine Review*. 1998. 3(4): 302-305.  
Monter B., et al. 1991. Kinetically controlled synthesis of dipeptides using ficin as biocatalyst. *Biotechnological Applications in Biochemistry* 14(2): 183-191.  
Ohmori T., Yang R.Y. 1996. Self-sustained pH oscillations in immobilized proteolytic enzyme systems. *Biophysical Chemistry* 59(1-2): 87-94.  
Pitchford P. 1993. *Healing with Whole Foods, Oriental Traditions and Modern Nutrition*. Revised ed. Berkeley, CA: North Atlantic Books; 127, 130, 148, 178, 492, 578, 581-582, 618.  
Spiller G.A., et al. 1998. Nuts and plasma lipids: an almond-based diet lowers LDL-C while preserving HDL-C. *Journal of the American College of Nutrition* 17(3): 285-290.

