

# Imu-Max



## CLINICAL APPLICATIONS

- Boosts Immune Function in Children
- Provides Support for Immune Challenges
- Maintains Normal Inflammatory Balance

## IMMUNE HEALTH

Imu-Max is a children's formula that boosts immune function and provides support for immune challenges. Imu-Max contains echinacea, one of the best-known botanicals used to boost the immune system, and propolis, a product of bee resin, which helps maintain normal inflammatory balance. Available in a convenient liquid delivery, Imu-Max contains a 300 mg blend of *Echinacea angustifolia* and *E. purpurea* propolis, and rose hips, plus 30 mg of vitamin C per serving, in a delicious berry flavor.

### Overview

The human immune system is a complex network of millions of immune cells, which act together to protect the body from constant exposure to threats from our environment. In most cases, the immune system does a great job of keeping people healthy, but it may at times require additional support. Research has demonstrated the ability of Imu-Max to protect the immunity of children in the winter months. A double-blind, placebo-controlled study was carried out on the efficacy of Imu-Max in a large group of children during a 12-week winter season. In a group of 430 children ages one to five, 215 children were given Imu-Max and 215 were given a placebo. Of the 328 children who completed the study, those in the Imu-Max group experienced a decrease in the occurrence and duration of upper respiratory challenges. Children in the Imu-Max group also had fewer days absent from day care, fewer unscheduled physician visits, and a significant improvement in throat irritations and general immune response.<sup>1</sup>

### Propolis<sup>†</sup>

Propolis is a resinous substance collected by bees to seal their hives and has traditionally been used in folk medicine since

ancient times.<sup>2</sup> Propolis extract has been found to maintain normal inflammatory balance.<sup>2,3</sup> A recent review found the key active ingredients in propolis include caffeic acid phenethyl ester (CAPE) and artemillin C, which modulate the immune system by suppressing T lymphocytes and activating macrophage function.<sup>4</sup> In a study examining the effects of propolis on 50 people, the duration of upper respiratory symptoms was 2.5 times shorter in the control versus the placebo group.<sup>5</sup> Propolis has also been shown to support immune response in mice exposed to a considerable amount of stress.<sup>6</sup> Propolis is an immune modulator with potent microbial-balancing properties, and it contains over 300 natural compounds, such as polyphenols, antioxidants and amino acids.<sup>7</sup>

### Echinacea<sup>†</sup>

Echinacea species are perennial plants native to Midwestern North America. In Native American medicine, echinacea was used more than any other plant for its wide range of applications, including providing support for immune challenges and maintaining normal inflammatory balance. Echinacea is a botanical that has been extensively studied and validated in its health-promoting properties. An analysis of data from a randomized, double-blind, placebo-controlled trial of *Echinacea purpurea* in 524 children, ages two to 11, found that those given echinacea demonstrated improved immune response and reduction in upper respiratory challenges, compared to those receiving a placebo.<sup>8</sup> A meta-analysis of three studies examining the efficacy of echinacea extracts in preventing the development of seasonal immune challenges found that those given echinacea showed a significant improvement in markers of immunity, versus children given a

<sup>†</sup> 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.

placebo.<sup>9</sup> An additional randomized, double-blind study found that treatment with echinacea at onset of upper respiratory challenges supported immune response in a much faster period of time versus placebo.<sup>10</sup>

### Directions

1 teaspoon (5 mL) 3 times per day or as recommended by your health care professional. Take with water, milk or the beverage of your choice.

### Does Not Contain

Gluten, corn, yeast, synthetic colors or artificial flavors.

### Cautions

If you are pregnant or nursing, consult your physician before taking this product.

<b>Supplement Facts</b>		
Serving Size 1 Teaspoon (5 mL)		
Servings Per Container About 50		
	Amount Per Serving	% Daily Value
Calories	20	
Total Carbohydrate	5 g	10%*
Total Sugars	<1 g	**
Vitamin C (as Calcium Ascorbate)	30 mg	33%
Proprietary Blend	300 mg	
Propolis Extract		**
Rose Hips Extract 1:7		**
<i>Echinacea purpurea</i> Extract (Roots)		**
<i>Echinacea angustifolia</i> Extract (Roots)		**

\* Percent Daily Values are based on a 2,000 calorie diet.  
 \*\* Daily Value not established.

Other Ingredients: Sorbitol, Glucose, Glycerin, Natural Flavors, Citric Acid, Carrot Juice (for color) and Sulfur Dioxide.

**ID# 852250 250 mL (8 fl oz)**

### References

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