



University of Bari
"Aldo Moro"

PROTEGOL

ORAL HEALTH

Formulated using the **SPAGYRIC METHOD**,
to **SUPPORT ORAL MUCOSAL HEALTH**,
based on **SCIENTIFIC EVIDENCE**

Provides a soothing action

Forms a protective barrier

Supports tissue recovery

**WITH PROPOLIS, ERYSIMUM, ESSENTIAL OILS,
VITAMIN C AND ZINC**

ACTIVE INGREDIENTS

PROPOLIS

A bee-derived resin naturally rich in flavonoids and polyphenols, valued for its antioxidant profile and for supporting the body's natural defenses, especially during seasonal changes.

HONEY

A precious natural ingredient obtained from floral nectar, honey provides enzymes, polyphenols and bee defensin-1, and is especially appreciated for its soothing effect on the throat and mucosal surfaces.

ERYSIMUM (HEDGE MUSTARD)

Traditionally used to soothe the oropharyngeal mucosa, helping support vocal tone and the normal function of the upper respiratory tract.

ESSENTIAL OILS

A selected blend of aromatic botanicals for respiratory comfort: Melaleuca for upper airway well-being, Eucalyptus for its balsamic action, and Manuka helps maintain bronchial fluidity.

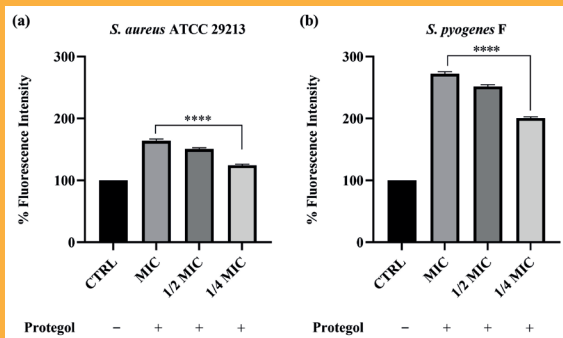


Figure 1. Cell wall permeability of *Staphylococcus aureus* ATCC 29213 (a) and *Streptococcus pyogenes* F (b) upon incubation with Protegol at MIC, 1/2 MIC, and 1/4 MIC concentrations. "+" and "-" denote treated and untreated samples, respectively. Fluorescence intensity is expressed as a percentage relative to the untreated control (CTRL, set at 100%). Data are presented as mean $\pm$ standard deviation (SD) of three independent experiments (n = 3). Significant differences versus CTRL: ** p < 0.0001. Results are shown as mean $\pm$ standard deviation (SD) (n = 3).

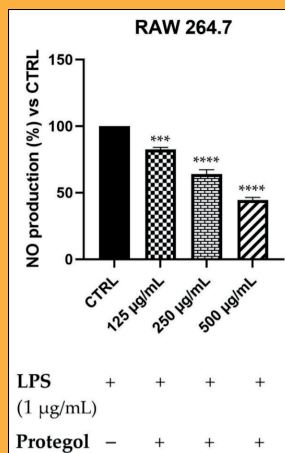


Figure 2 Nitric oxide (NO) levels in RAW 264.7 macrophages stimulated with LPS (1 µg/mL) and treated with increasing concentrations of Protegol (125, 250, and 500 µg/mL). "+" and "-" denote treated and untreated samples, respectively. NO production was quantified using the Griess assay and expressed as a percentage relative to the LPS-treated control. Data are presented as mean $\pm$ standard deviation (SD) of three independent experiments (n = 3). Significant differences versus CTRL: *** p < 0.001, and **** p < 0.0001.



READ THE SCIENTIFIC STUDY

BACTERIAL-RELATED CONDITIONS

COLD SYMPTOMS

PHARYNGITIS

THROAT IRRITATION

TONSIL IRRITATION

SURGICAL PROCEDURES OF THE ORAL CAVITY

TEMPERATURE CHANGES

NON-SPECIFIC THROAT IRRITATION



DIRECTION OF USE:

3-4 sprays, 3 times daily.
Maximum daily dose: 1.5 ml.

NUTRITIONAL INFORMATION

Average content of characterizing ingredients	Per dose daily (1.5 ml)	NRV%*
Propolis EI	825mg	
Hedge Mustard EI	300mg	
Vitamin C	24mg	30
Manuka EO	4,5mg	
Eucalyptus EO	4,5mg	
Tea tree EO	1,5mg	
Zinc	1,5mg	15

*NRV: daily reference nutritional values for vitamins and minerals for an average adult - EU Reg. 1169/2011

