

ANALYSIS OF THE ALLERGENIC POTENTIAL EXTRACT OF THE HOUSE DUST MITE
Glycycometus malayensis.

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Introduction: Dust mites are one of the primary sources of aeroallergens and are closely associated with allergic diseases such as asthma and rhinitis. Among these, *Glycycometus malayensis* is a mite species found in house dust, which is morphologically similar to *Blomia tropicalis*, making its identification challenging. Studies have shown that patients with asthma and rhinitis often test positive for *G. malayensis* through skin prick tests and specific IgE reactivity. Despite its potential clinical significance, the specific allergens and allergenic potential of *G. malayensis* remain poorly characterized. Investigating these allergens is crucial for understanding the species' contribution to allergic diseases and for developing more effective diagnostic and therapeutic tools. **Objectives** To cultivate *G. malayensis* in a laboratory setting, extract its antigens to produce an allergenic extract, and evaluate its reactivity using serum from atopic and non-atopic individuals through ELISA. Additionally, to analyze the mite's proteins using one-dimensional electrophoresis and immunoblotting and compare the IgE reactivity of *G. malayensis* with other clinically important mites. **Material and Methods:** Dust mite cultures were selected and characterized using PCR-based molecular identification. Protein extracts were prepared from pure cultures containing *B. tropicalis* and *G. malayensis*, while the *Dermatophagoides pteronyssinus* protein extract was obtained from mites purchased from a specialized supplier. These protein extracts were utilized in indirect ELISA assays and immunoblotting to evaluate IgE reactivity, using sera from atopic and non-atopic individuals from Salvador, Brazil. **Results and conclusions:** The analysis revealed that atopic patients exhibited similar IgE reactivity to the extracts containing *B. tropicalis* and *G. malayensis*. Interestingly, IgE reactivity to the *Dermatophagoides pteronyssinus* extract was lower compared to the extracts from *B. tropicalis* and *G. malayensis*. This study underscores the immunogenic potential of *G. malayensis* and its significance within the tested population from Salvador, Brazil.

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