



August 24, 2023

Intake of LAC-Shield™ maintains good physical condition of healthy adult men and women

**Confirmed the effectiveness of LAC-Shield™ selected to “support health”
- Published in the scientific journal *Nutrients*-**

Morinaga Milk Industry recently conducted a clinical trial in an industry–government collaboration with Yamaguchi Prefecture, Yamaguchi City, and Yamaguchi Health Lab*¹, and found that the intake of LAC-Shield™ (*Lactocaseibacillus paracasei* MCC1849)^{*2} relieved the comprehensively analyzed subjective cold-like symptoms of healthy adult men and women, including local symptoms such as nasal congestion and sore throat, as well as local and general symptoms such as feverishness. We are pleased to report that the results of this research have been published in the scientific journal *Nutrients*^{*3}.

[Background and Objectives of Research]

Previous studies have shown that LAC-Shield™ suppresses the onset of cold-like symptoms in healthy adult women* who are prone to catching common cold. In this study, we investigated the effects of the intake of LAC-Shield™ on health maintenance in adults of a broad age range.

* Healthy adult women who have incidence of common cold with subjective symptoms in the previous year

[Research Details]

Subjects: 200 healthy adult males and females (21–62 years old) living in Yamaguchi Prefecture
Study design: Randomized, double-blind, placebo-controlled parallel-group study
Duration: December 2021 to May 2022 (24 weeks of ingestion)
Details: Participants were randomly divided into two groups and consumed either a placebo or a food containing LAC-Shield™ (50 billion CFU/day) and were asked to keep a daily diary on their physical condition, such as their nose and throat. After the study, we evaluated the number of days of onset of each symptom and the duration of the symptom per onset.

[Main Results]

The number of days of stuffy nose onset and the duration of symptoms of stuffy nose and sore throat were significantly reduced in the group who took LAC-Shield™ compared to the placebo group. In addition, the number of days of onset of cold-like symptoms (evaluation of the number of days the symptoms were present) and duration (evaluation of the extent to which symptoms persist per onset) were significantly reduced in the LAC-Shield™ group compared to the placebo group (Figure 1).

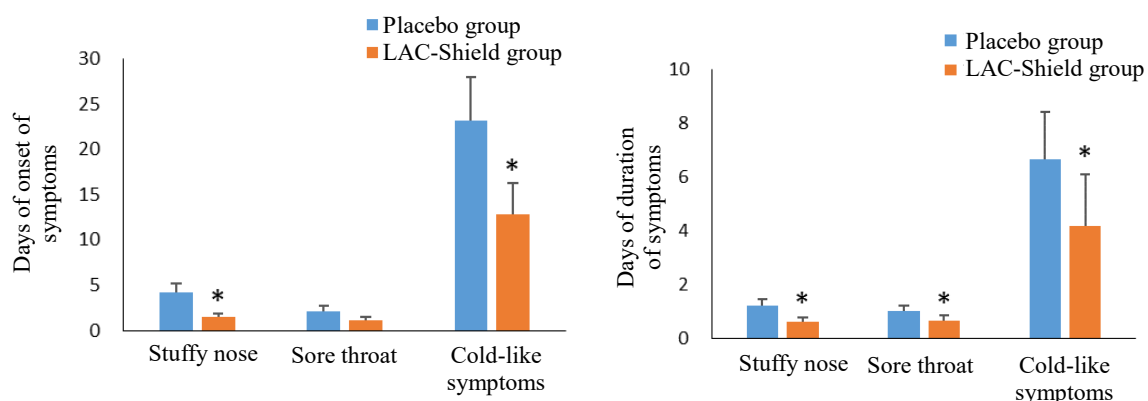


Figure 1: Days of onset of stuffy nose, sore throat, and cold-like symptoms (left) and days of duration of symptoms (right)
(Significant difference between groups $*p < 0.05$)

[Summary]

The results of this study suggested that intake of LAC-Shield™ relieves stuffy nose, sore throat, and cold-like symptoms in healthy adult men and women. No side effects were observed during the long-term intake of 24 weeks, suggesting that LAC-Shield™ may be able to contribute to maintaining physical condition through daily diet. Morinaga Milk Industry will continue to utilize the knowledge gained through the initiative with Yamaguchi Prefecture, Yamaguchi City, and Yamaguchi Health Lab in the development of functional ingredients that can contribute to the health and happy lives of many customers.

<Reference>

*1 Industry–government collaboration with Yamaguchi Prefecture and Yamaguchi City (Yamaguchi Health Lab)

Yamaguchi Prefecture and Yamaguchi City established Yamaguchi Health Lab to support the commercialization of healthcare-related products developed by companies. Since 2021, Morinaga Milk Industry have been working with Yamaguchi Health Lab to verify the effects of food ingredients such as bacteria and peptides on health through this industry–government collaboration. In 2023, we concluded a partnership agreement for the promotion of healthcare-related industries with Yamaguchi Prefecture and Yamaguchi City. Going forward, we will continue to jointly promote research on “Food and Wellness” and contribute to maintaining the health of the local community.

*2 LAC-Shield™ (*Lacticaseibacillus paracasei* MCC1849)

LAC-Shield™ is a lactic acid bacteria selected from thousands of Morinaga Milk Industry’s proprietary strains under the key phrase of “supporting health.” Because it does not impair the original taste of food

products, LAC-Shield™ can be easily consumed “while enjoying the same deliciousness.” To date, it has been adopted by more than 500 companies and in more than 1,000 types of products.

***3 Title and authors of paper**

Effects of Heat-Killed *Lacticaseibacillus paracasei* MCC1849 on the Maintenance of Physical Condition in Healthy Adults: A Randomized, Double-Blind, Placebo-Controlled, Parallel-Group Study

Soichiro Sato, Satoshi Arai, Noriyuki Iwabuchi, Miyuki Tanaka, Ryosuke Hase and Naoki Sakane

Nutrients 2023, 15(15), 3450;

<https://doi.org/10.3390/nu15153450>

<For press inquiries>

Morinaga Milk Industry Co., Ltd. Investor& Public Relations Department Watanabe Phone:03-3798-0126

Disclaimer: This English translation is provided for the benefit of readers. In the case that discrepancies exist between the original Japanese version and the English translation, precedence goes to the original Japanese version.