The Journal of Laryngology & Otology

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Probiotics for chronic rhinosinusitis, olfactory recovery following omicron variant infection and aural myiasis in Ancient Rome

Jonathan Fishman and Edward Fisher, Editors

Editorial

Cite this article: Fishman J, Fisher E. Probiotics for chronic rhinosinusitis, olfactory recovery following omicron variant infection and aural myiasis in Ancient Rome. *J Laryngol Otol* 2023;**137**:1299. https://doi.org/10.1017/S0022215123002037

Received: 14 November 2023
Accepted: 14 November 2023

As 2023 draws to a close, several articles in this final issue of the year deserve special mention. A systematic review by Fong *et al.*, in this month's issue of *The Journal of Laryngology & Otology*, evaluated the effectiveness and safety profile of probiotics in chronic rhinosinusitis.[1] From 948 records screened, 4 randomised, controlled trials were included in their review (2 were analysed in the most recent European Position Paper on Rhinosinusitis – 2020 guidelines, plus an additional 2 trials), with a total of 318 chronic rhinosinusitis patients. A meta-analysis of pooled Sino-Nasal Outcome Test (SNOT) score outcomes showed no reduction in SNOT scores from the initial assessment to the study endpoints. This suggests that, from a patient symptom perspective, overall symptom reduction may be marginal or insignificant with probiotic use. However, when the SNOT subscale breakdown analysis was analysed, this appeared to show significant improvements in the sleep (5.5 per cent reduction; $p = 0.02$), psychological (4.0 per cent reduction; $p = 0.03$) and rhinological (5.0 per cent improvement; $p = 0.03$) symptom subscales. The authors call for future trials, to fully determine the utility of probiotics in chronic rhinosinusitis.[1]

The scientific literature appears to show that the prevalence of olfactory dysfunction as a result of coronavirus disease 2019 (Covid-19) infection has decreased over time, from over 50 per cent in the early pandemic waves, to 1–30 per cent in those with Covid-19 caused by the omicron variant.[2–6] However, to date, no studies have assessed whether this lower prevalence corresponds to a lower frequency of persistent olfactory dysfunction. Vaira *et al.*, in this month's issue of *The Journal*, evaluate the recovery of olfactory function at six months in individuals infected with the Covid-19 omicron variant, compared with healthy controls, using psychophysical tests.[7] In this study, omicron variant infection was associated with a significantly lower persistent olfactory dysfunction rate than previous Covid-19 variants, and, at six months, the prevalence of olfactory dysfunction in infected patients did not differ significantly from that in the general population. It has been hypothesised that the omicron variant is less destructive to the olfactory neuroepithelium and less neuroinvasive.[8] Moreover, high concentrations of nasal immunoglobulins (e.g. from prior vaccination and/or previous infection) are protective.

From a historical perspective, Agnelli and King research the history surrounding aural myiasis, with the earliest case being reported by Celsus in the first century.[9]

The Senior Editors would like to take this opportunity to thank all those who have contributed to this year's journal, including all the authors, Assistant Editors, reviewers, advisers, production staff, our publishing partners at Cambridge University Press and all other colleagues at *The Journal*. Finally, we wish all of our readers a happy and successful 2024.

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https://doi.org/10.1017/S0022215123002037 Published online by Cambridge University Press