

A Systematic review: The risk to develop T2D in generations of migrant South Asian, Caribbean and African, in relation to adopted lifestyle and diet

Track B.2: Gastronomic Heritage - Dietary and Cultural perspectives

Arif Ahmed^{1*}, Amalia Tsiami¹, Hafiz T.A. Khan²

¹London Geller College of Hospitality and Tourism, University of West London, UK

²Public Health Group, University of West London, UK

*Corresponding author 21470593@student.uwl.ac.uk, St Marys' Road, University of West London, W5 5RF, London, UK

Abstract text/Policy contribution

Type-2 diabetes (T2D) is common in South and Southeast Asian, African and Caribbean immigrants in developed countries. Thus, the current systematic literature review (SLR) aims to examine the risk of T2D over different generations given their dietary and lifestyle habits.

Studies selected in this SLR should include the above population for first generation and second-generation immigrants living in developed countries having T2D, articles written in English and discussing dietary or lifestyle habits.

The search was carried out in PubMed and CINAHL for articles published between 1974 – 2022 using keywords like South Asia*, Diet*, Lifestyle, Smoking, Alcohol*, Generation*, etc. AXIS Tool and the JBI appraisal tools used for evaluating quality check of the studies.

A total of 6195 hits were found and after removing duplicates 5046 duplicate free articles were used in screening process, and 9 articles were finally selected, which satisfy the inclusion criteria. They are mostly based on UK and USA and published between 2015-2023.

The findings indicate that eastern Asians have higher prevalence in men than women (25.5% vs 19.9%, in 1993; 40.6% vs 32.4%, in 2000, $p < 0.05$).

Overall, Forest Plot demonstrates lower T2D odds in second generation compared to the first generation in all selected ethnic groups, however, there are few exceptions. Moreover, higher odds of T2D revealed in men vs women, in longer vs shorter periods of immigrants, in former smokers, non-alcoholic, and in those who sleep <7 hours and >8 hours per day.

Thus, the evidence demonstrates that first generation people should be more cautious to follow healthy lifestyles in order to reduce prevalence T2D than the other generations of ethnic minority people.