



144 - MEDITERRANEAN LIFESTYLE AND RISK OF RECURRENT CARDIOVASCULAR EVENTS: A PROSPECTIVE STUDY FROM THE UK BIOBANK

M.C. Aznar de la Riera, J. Díaz-Gutiérrez, R. Ortolá, J.L. Romero-Cabrera, J. López-Miranda, P. Pérez-Martínez, S.N. Kales, F. Rodríguez-Artalejo, M. Sotos-Prieto

Department of Preventive Medicine and Public Health, School of Medicine, Universidad Autónoma de Madrid; CIBERESP (CIBER of Epidemiology and Public Health); Department of Cardiology, Hospital de la Santa Creu i Sant Pau; Lipids and Atherosclerosis Unit, Maimonides Institute for Biomedical Research in Cordoba (IMIBIC), Reina Sofia University Hospital, University of Córdoba; CIBEROBN (CIBER in Physiopathology of Obesity and Nutrition); Department of Environmental Health, Harvard T.H. Chan School of Public Health; IMDEA-NUTRITION Institute, CEI UAM+CSIC.

Resumen

Background/Objectives: The Mediterranean Lifestyle Index (MEDLIFE) evaluates adherence to traditional Mediterranean living. Evidence supporting its role in secondary prevention of cardiovascular disease (CVD) beyond the Mediterranean remains limited. Thus, this study aimed to evaluate the association between the MEDLIFE and risk of major cardiovascular events (MACE) and death from CVD and all causes in British adults with previous MACE.

Methods: This analysis included 5,851 individuals aged 40-70 years from the UK Biobank, with history of MACE at baseline (2009-2012), who were followed-up until 2024. The MEDLIFE score was computed based on adherence to 25 item recommendations that included three main blocks: 1) “Mediterranean food consumption”, 2) “Mediterranean dietary habits”, 3) “Physical activity, rest, social habits, and conviviality”. Incident MACE was ascertained through hospital admissions data, while mortality data was obtained from the national death index. Cox proportional-hazards regression models were used to estimate hazard ratios (HRs) and 95% confidence intervals (CIs), adjusting for key confounders.

Results: During a median follow-up of 10.2-12.1 years, 2,702 recurrent MACE were identified. Compared to participants in the lowest quartile (Q) of adherence, the HR (95%CI) for MACE was 0.95 (0.86, 1.05) for Q2, 0.88 (0.79, 0.98) for Q3, and 0.83 (0.74, 0.94) for Q4 (p-trend < 0.001). This association (Q4 vs. Q1: HR, 95%CI) was even more pronounced for mortality from CVD (0.54, 0.39-0.76) and all-causes (0.69, 0.57-0.81). Each MEDLIFE block contributed significantly to the observed associations and sensitivity analyses confirmed their robustness.

Conclusions/Recommendations: In this cohort of British adults with MACE, higher MEDLIFE adherence was associated with lower risk of recurrent MACE, CVD and overall mortality, supporting its potential as a secondary prevention strategy.

Funding: Carlos III Health Institute, the Secretary of R+D+I; the European Regional Development Fund/European Social Fund (FIS grants 22/1111; 23/00079); National Agency of Research (CNS2022-135623); Ministerio de Educación, Formación Profesional y Deportes (FPU contract to MDCAR).