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626 - TRENDS AND GEOGRAPHICAL INEQUALITIES IN DIABETES MELLITUS MORTALITY IN SPANISH CITIES, 1996-2015

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Resumen

Background/Objectives: Diabetes mellitus (DM) remains a major cause of mortality and an indicator of social inequalities in many European populations. The aim of this study was to describe the temporal evolution of DM mortality between 1996 and 2015 in Spain and to explore the association between mortality and economic deprivation.

Methods: We carried out an ecological study in 22 Spanish cities using census tracts as the unit of analysis. DM mortality data were obtained for the period 1996-2015. Age-standardized mortality rates were estimated and smoothed using Bayesian models. A census tract-level deprivation index was calculated and its association with DM mortality was assessed separately for men and women in each city.

Results: A total of 38,762 DM-related deaths were recorded during the study period. Overall, age-adjusted mortality rates were higher in men than in women. Mortality trends were generally decreasing or stable across cities, with notable exceptions in Mallorca and Murcia. In the most recent period (2012-2015), the highest standardized mortality rates were observed in Murcia and Huelva overall; in men, in Jaén and Murcia; and in women, in Huelva and Castellón. Among men, a positive association between census tract deprivation and DM mortality was observed in 8 cities, with the largest relative risk in Barcelona (Relative Risk (RR): 1.38; 95% credible interval (95%CI): 1.27-1.51). Among women, this association was present in 20 cities, reaching the highest relative risk in San Sebastián (RR = 2.48; 95%CI: 1.84-3.33).

Conclusions/Recommendations: Mortality from diabetes mellitus in Spanish cities shows a general downward or stable trend over time, along with marked socioeconomic inequalities, especially among women. Identifying cities and areas where deprivation is most strongly associated with mortality from diabetes mellitus can help design specific public health strategies to maintain and reinforce the recent decline in mortality and prevent the increases that are now being observed in some areas.

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