Dementia burden among migrants in Denmark compared with Danish-born: a register-based cohort study

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Background
The burden of cognitive impairment has increased substantially as a consequence of population ageing. Ageing processes and morbidity patterns may vary according to country of origin, however little is known regarding cognitive impairment among the increasing numbers of ageing migrants in Europe. This study was undertaken to compare the burden of dementia among migrants and Danish-born.

Methods
A register-based, historical prospective cohort study. Refugees and family reunified immigrants (n = 114,331) who had obtained residency in Denmark from 1993 to 2010 were included and matched 1:6 on age and sex with Danish-born (n = 686,562). Personal identification numbers were cross-linked to the Danish National Patient Registry and the Psychiatric Central Register identifying all first-time dementia related hospital contacts between 1st of January 1994 to 31st December 2011. We estimated the incidence rate ratios (IRR) of dementia according to migrant status adjusting for age and sex in a Poisson regression. We further assessed the distribution according to type of dementia and main countries of birth.

Results
IRRs of dementia were slightly lower among migrants compared with Danish-born (0.91; 95% CI: 0.83-1.00). Family-reunified migrants had a significantly lower IRR for all-type dementia (0.65; 0.55-0.76) whereas migrants from Afghanistan had a significantly higher IRR (1.50; 1.09-2.08) compared with Danish-born. Migrants overall had a significantly lower IRR for Alzheimer’s dementia compared with Danish-born (0.66; 0.53-0.83). Among family-reunified migrants the IRR was 0.48 (0.32-0.74). We found no significant differences in IRR for vascular dementia.

Conclusions
Incidence of dementia was significantly lower among family-reunified migrants but not among migrants from Afghanistan. Research is needed to identify factors including healthcare utilization, language and cultural barriers to diagnosis that may explain the lower incidence of dementia among migrants.

Key messages:
- Dementia incidence was significantly lower among family-reunified migrants, but not among Afghani migrants. Traumas associated with seeking refuge may be a risk factor for developing dementia
- Findings may reflect an overall low burden of dementia among migrants, however more research is needed to identify potential barriers in access to diagnosis for migrants groups