2 further adjusted for education and work status, model 3 included depression and self-rated health, and finally, model 4 included all covariates as well as physical activity, smoking and alcohol consumption. Additionally, interactions with age, sex, marital status, education, and work status were investigated.

Results The analytical sample had an average age of 65 years (SD=7.01). We found that 22% of respondents engaged in gaming. Furthermore, of those participants who gamed, 65% were females and 48% were between 61 to 70 years old. Interaction analyses indicated that for younger individuals (≤65 years), gaming predicted lower scores in the self-realization sub-scale of the CASP-19 ( $\beta$ =-0.33, 95% CI -0.62 to 0.04, p=0.03) in comparison to >65+ gamers. Furthermore, for widowed individuals, gaming predicted lower scores in CASP-19 ( $\beta$ =-2.63, 95% CI -4.68 - to 0.58, p=0.01), indicating a lower quality of life in comparison to married, or single participants. Further analysis indicated that widowed individuals had lower scores in the self-realization ( $\beta$ =-0.90, 95% CI -1.68 to -0.11, p=0.03) and pleasure sub-scales  $(\beta=-0.62, 95\% \text{ CI } -1.17- \text{ to } -0.07, p=0.03) \text{ of CASP-19}.$ There was also a marginal association for widowed individuals who game and lower scores in the autonomy subscale  $(\beta=-0.58, 95\% \text{ CI } -1.18 \text{ to } 0.12, p=0.06)$ . There were nonsignificant associations between gaming and loneliness and

Conclusion Online gaming might be independently associated with lower levels of quality of life, particularly in terms of pleasure, self-realisation, and autonomy. This association might be modified by the individual's age and marital status. Widowed individuals who game appear to be more likely to report a lower sense of self-realisation, pleasure, and autonomy with some implications for their well-being.

## P73

## USING PEER RESEARCH METHODS: TO EXPLORE HIGH MORTALITY RATES AMONG PEOPLE WITH MULTIPLE COMPLEX NEEDS

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Background Multiple complex needs (MCN) is one of a number of terms used to describe people facing co-occurring issues of homelessness, substance misuse, offending, and mental ill-health. When considered in isolation, homelessness, substance misuse, mental ill-health and offending, each contribute to high mortality rates; however, when co-occurring this effect is amplified. A large amount of the mortality research to date within MCN populations has been epidemiological. Despite acknowledge of the benefits of conducting research withindividuals rather than on, there is limited involvement of peer research methods in current studies exploring mortality and MCN. This research aimed to explore the perspectives of people with lived experience of MCN and professionals who support them on the perceived reasons underlying high mortality rates among people with MCN.

Methods Using peer research methods, three focus group discussions (21 participants) were conducted within the North

East of England to explore the perspectives of people with MCN, frontline staff, and managers/commissioners.

Results Findings from this study provide valuable perspectives of people with MCN and those that provide them with support on what may be perceived factors underlying premature mortality. Mental ill-health and substance misuse (often co-occurring dual diagnosis) were perceived as influencing premature mortality among MCN groups. Perceptions of opportunities for identify people at-risk included critical life events (e.g. bereavement, relationship breakdown) and transitions (e.g. release from prison, completion of drug treatment). Early prevention, particularly supporting young people experiencing adverse childhood experiences was also highlighted as a priority.

Conclusion High mortality in MCN groups may be reduced by addressing dual diagnosis, providing more support at critical life events, and investing in early prevention efforts. The novelty of this study is it has shown the value of listening to and conducting research with individuals with experience of MCN. It enabled an exploration of an issue that directly affects their community and supported understanding of the personal perspective of a handful of people with MCN and their carers on what may have informed premature mortality among their networks, as well as identifying perceived avenues for possible preventive interventions within the local region. Furthermore, the insights specific to opportunities for service provision take into consideration the intricate nature of MCN and improve service access and navigation.

## P74

## A LIFECOURSE PERSPECTIVE ON HISTORICAL DEMOGRAPHIC PATTERNS OF CIRCULATORY SYSTEM DISEASE AND ALL-CAUSE MORTALITY IN TWENTIETH CENTURY AUSTRALIA

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Background Circulatory System Disease (CSD) patterns vary over time and between countries, related to lifestyle risk factors across the life course, associated in turn with socioeconomic circumstances. Current global CSD epidemics in developing economies are similar in scale to those observed previously in the United States and Australia. We examine from a lifecourse perspective the historical context in Australia for the rise and decline of CSD based on the published scientific literature and population trends. Past epidemiological studies focused on the relative advantage of those of Southern European compared to those of British or Irish origin. Historical retrospective cohort studies in populations including world war one veterans and maternity hospital data have shown early life influences on later health outcomes.

Methods We employed data from census-derived place of birth by age bracket and sex from 1891 to 1986, based on digitised paper record. CSD mortality rates were available from 1907 to 2016 and age-specific rates were computed for the general population. All-cause mortality for the foreignborn (fb) from 1910 to 1980 was not readily available, as