MONTHLY REPORT ON WEEKLY NUMBERS OF DEATHS IN SOUTH AFRICA

MARCH 2026

(TO EPIWEEK 12)

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South African Medical Research Council
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UCT Centre for Actuarial Research

Glossary:

Actual number of deaths: The actual number of deaths in South Africa have been estimated from the numbers recorded on the National Population Register. We use weighting factors set to produce results consistent with those of the annual Rapid Mortality Surveillance Report to account for deaths of persons who are not on the National Population Register as well as those that have not been recorded at all. The adjustments to account for incompleteness of recording of deaths on the National Population Register were re-estimated taking into account the 2017 cause-of-death data released by Stats SA in 2021.

Epi-week: We report by an 'Epi-week' consistent with CDC and many NICD reports which run from Sunday to Saturday, ensuring continuity of weeks from one year to the next. Each week is aligned with the 'Epi-year' that has 4 or more days in that week. For example, Week 53 of 2020 is from 27 December 2020 to 2 January 2021, Week 1 of 2021 is 3 January – 9 January 2021, Week 1 of 2022 is 2 January – 8 January 2022, Week 1 of 2023 is 1 January – 7 January 2023, Week 1 of 2024 is 31 January 2023 – 6 January 2024 and Week 1 of 2025 is 29 December 2024 – 4 January 2025.

Predicted number of deaths: The predicted number of weekly deaths have been calculated from historic data modelled for the periods **2015-2019** and **2023-2024** (i.e. excluding the period affected directly by the COVID-19 pandemic). A single negative binomial model using population estimates as an offset has been used for unnatural deaths allowing for age, sex and provincial variations in mortality rates. Negative binomial models have been fitted for natural deaths in each province in 10-year age groups from 5 years of age, allowing for different historical trends in each age group. In contrast, for <1 year and 1-4 years, the predicted numbers were set to the average rates for the periods **2015–2019** and **2023-2024** for males and females combined. Estimation of the predicted numbers of weekly deaths, against which to assess the excess, was originally achieved using a time series approach. For monitoring in 2022, a negative binomial modelling approach was introduced which took into account estimates of the population as well as the weekly variations in the numbers of deaths. After a careful evaluation of the trends in mortality rates since 2014, the models were adjusted for monitoring in 2023. It was noted that rates of change in mortality differed by age group. Briefly, the predicted values for the weekly deaths are based on negative binomial models for natural deaths for each province for 10-year age groups (to deal with digit preference in the deaths) from 5-years of age allowing for age-specific trends. For child deaths <1 year and 1-4 years, the average deaths rates for 2015 – 2019 were continued. Deaths in the 10-year age groups have been redistributed to the component five-year age groups in proportion to mortality increases between the 2 five-year age groups from model life table (Coale & Demeny West level 20) up to the age group 35-44. The apportionment for age group 35-44 was applied to all the older age groups.

P-score: The p-score is frequently used to describe excess mortality. It is the percentage change in the number of deaths from the expected number for that week. Negative values below 0% reflect a deficit in deaths while positive values reflect an excess.

Growing demographic uncertainty: Uncertainty about the estimates of completeness of death registration has unfortunately grown through a lack of good quality demographic data in recent years. The 2022 census was unable to provide much-needed contemporary information regarding fertility and mortality trends, and the last South Africa Demographic and Health Survey and mid-census Community Surveys were conducted in 2016.

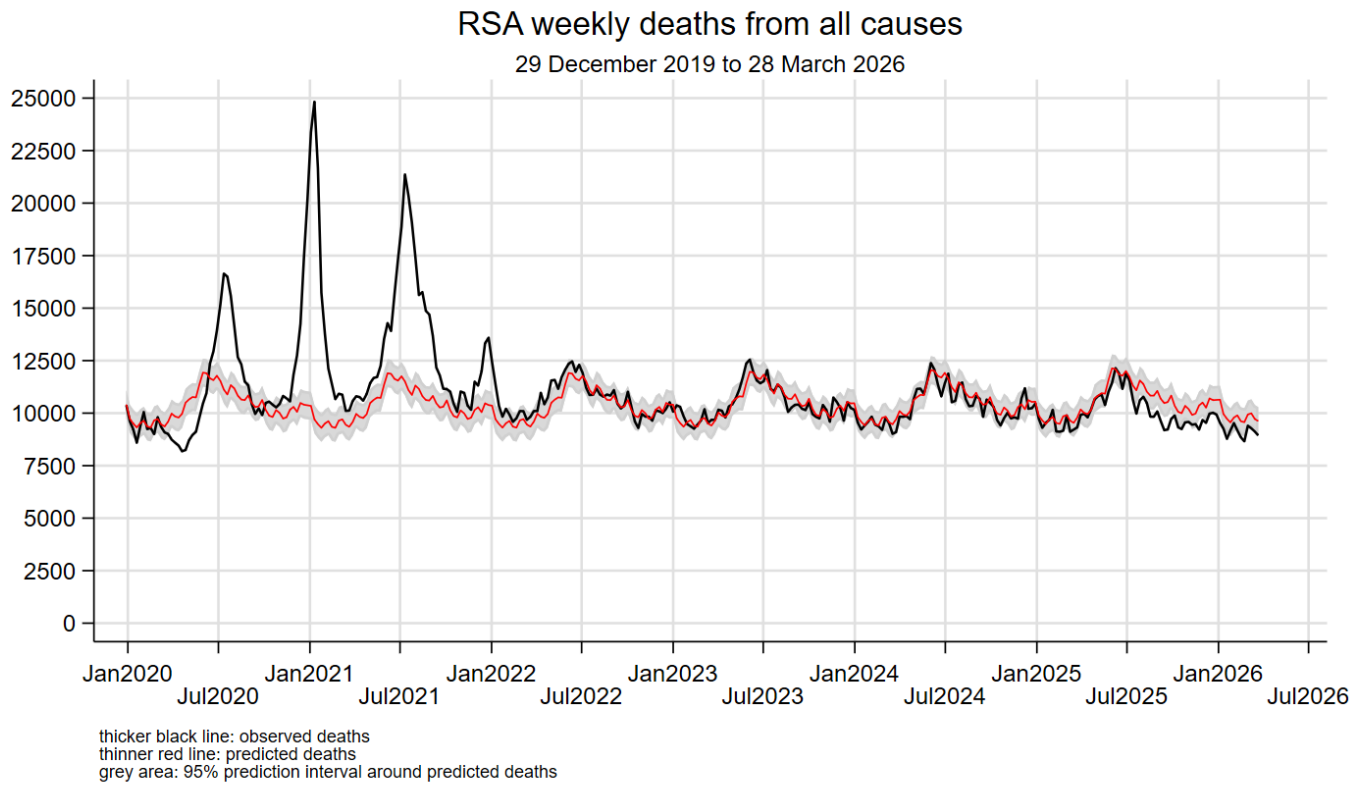
Background

The series of reports on weekly deaths in South Africa, based on data from the National Population Register provided to the SAMRC started in March 2020. During 2025, the data management system was further systematised and upgraded while the estimation of the predicted number of weekly deaths has been re-estimated to consider the extended data series including both the pre-COVID (2015-2019) and post-COVID (2023-2024) periods. This report for **March 2026** provides estimates of the weekly number of deaths of all persons in South Africa up to the end of epidemiological **Week 12** of **2026**, till **28 March 2026.** It reports national estimates for all causes of death as well as natural and unnatural causes separately.

Trends during March 2026

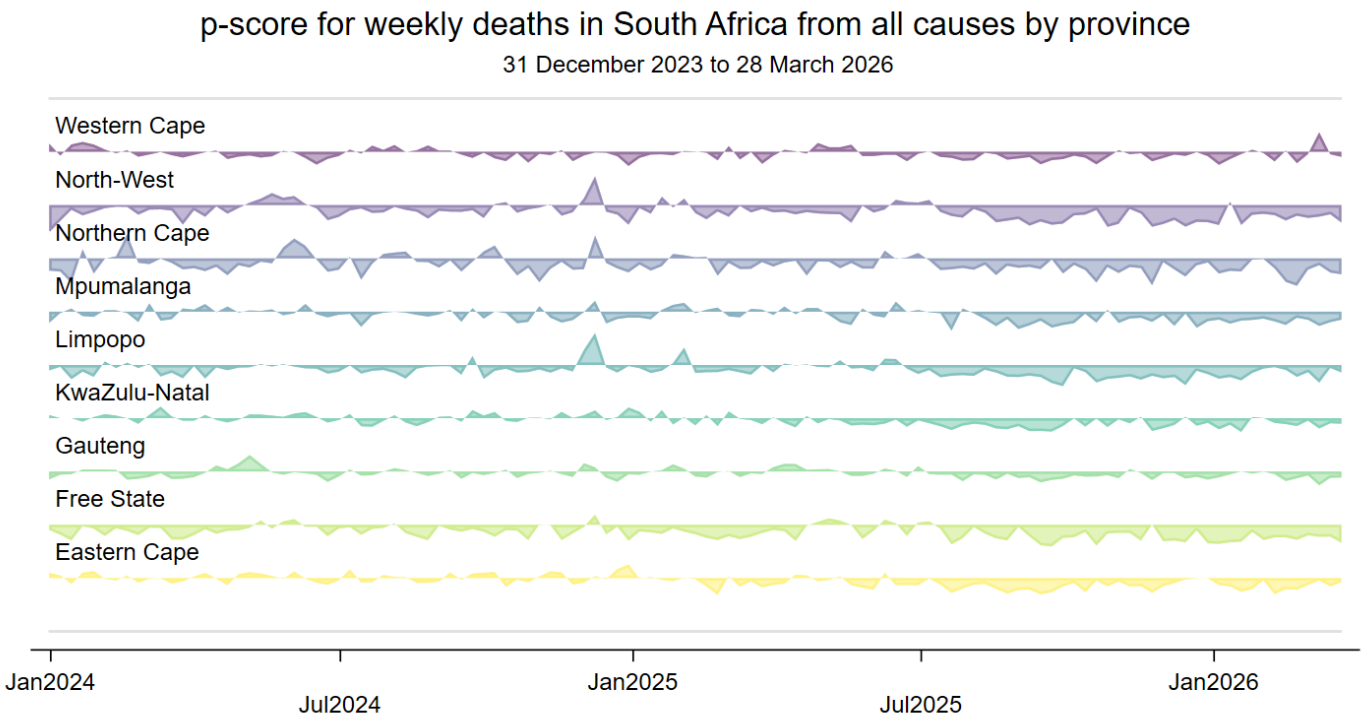
- Following noticeably lower numbers of deaths in the second half of 2025, the numbers in 2026 have continued to track below the lower uncertainty bound, particularly the deaths from natural causes among infants and children aged 1-4 years. In addition, the 80+ year age group has continued to track below the lower uncertainty band. The reason for the lower number is unclear at present and is the subject of ongoing evaluation and investigation.

- Deaths in the **Western Cape Province** spiked during **Week 10 (8 – 14 March 2026)** with 212 excess deaths over and above the predicted number of 1155, resulting in an increase of 18%. The excess were mostly deaths from natural causes and occurred in adult ages. The **Western Cape** experienced particularly high temperatures during that week.



Numbers have been scaled to the estimated actual number of deaths

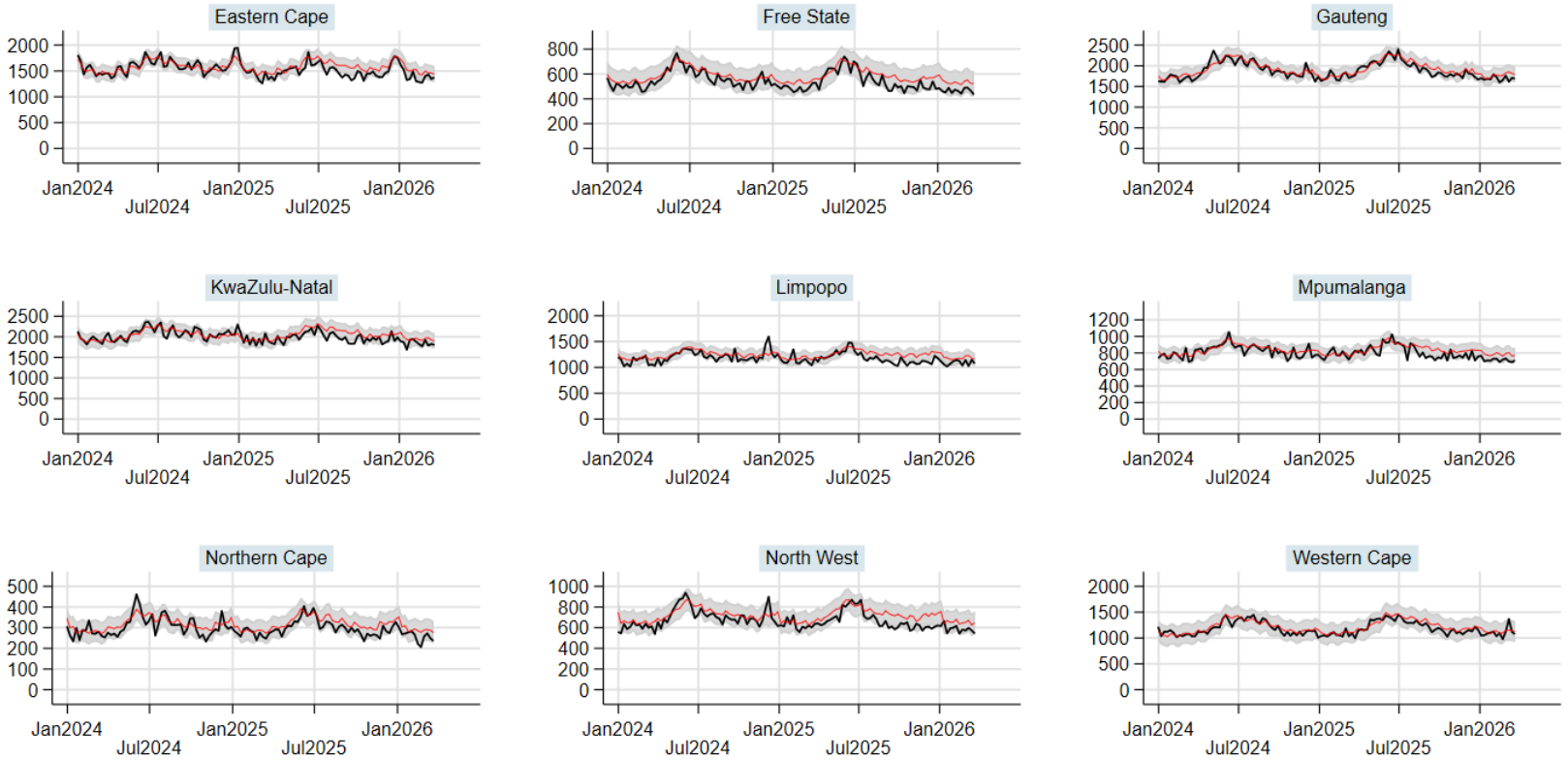
All-cause deaths by province



Y-axis: each vertical increment represents 50% above or below predicted

Deaths from all causes, by province

31 December 2023 to 28 March 2026



thicker black line: observed deaths
thinner red line: predicted deaths
grey area: 95% prediction interval around predicted deaths

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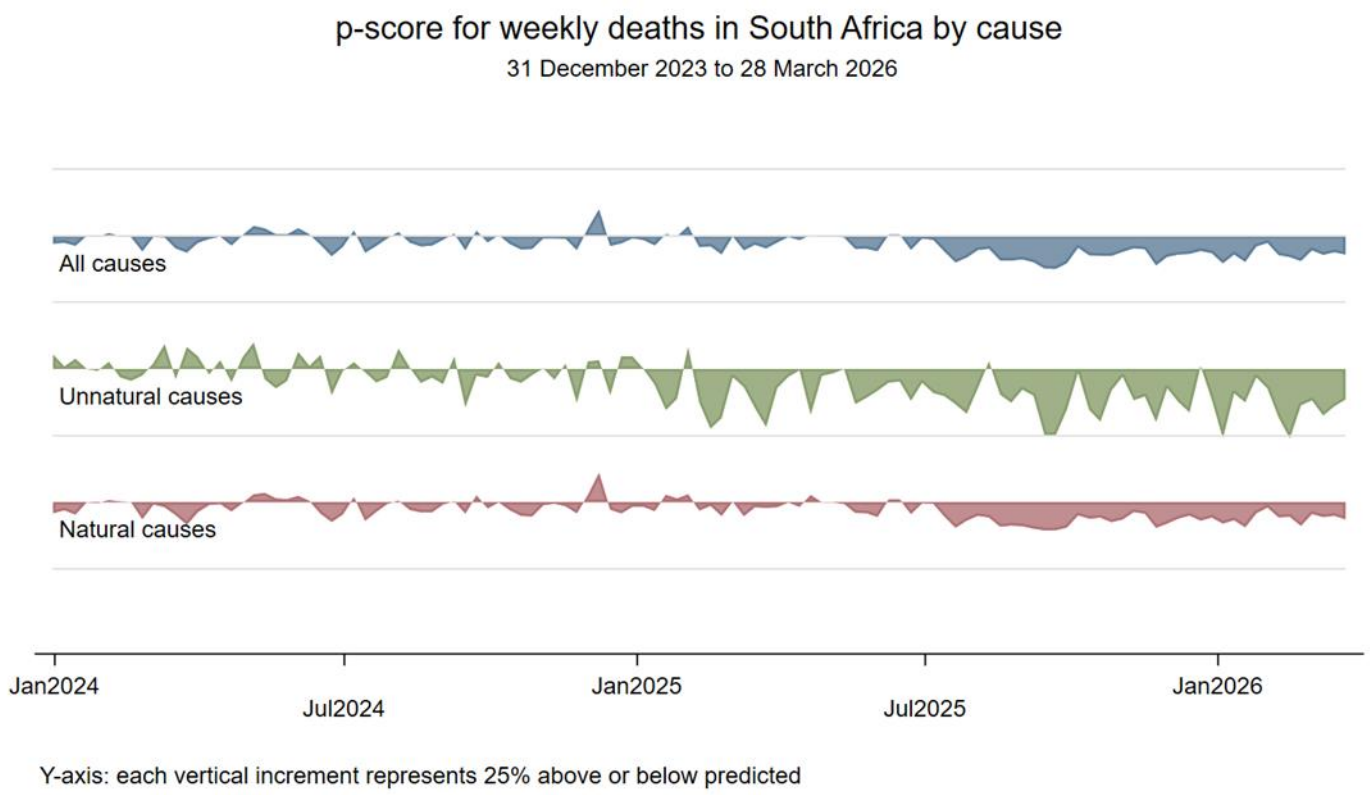
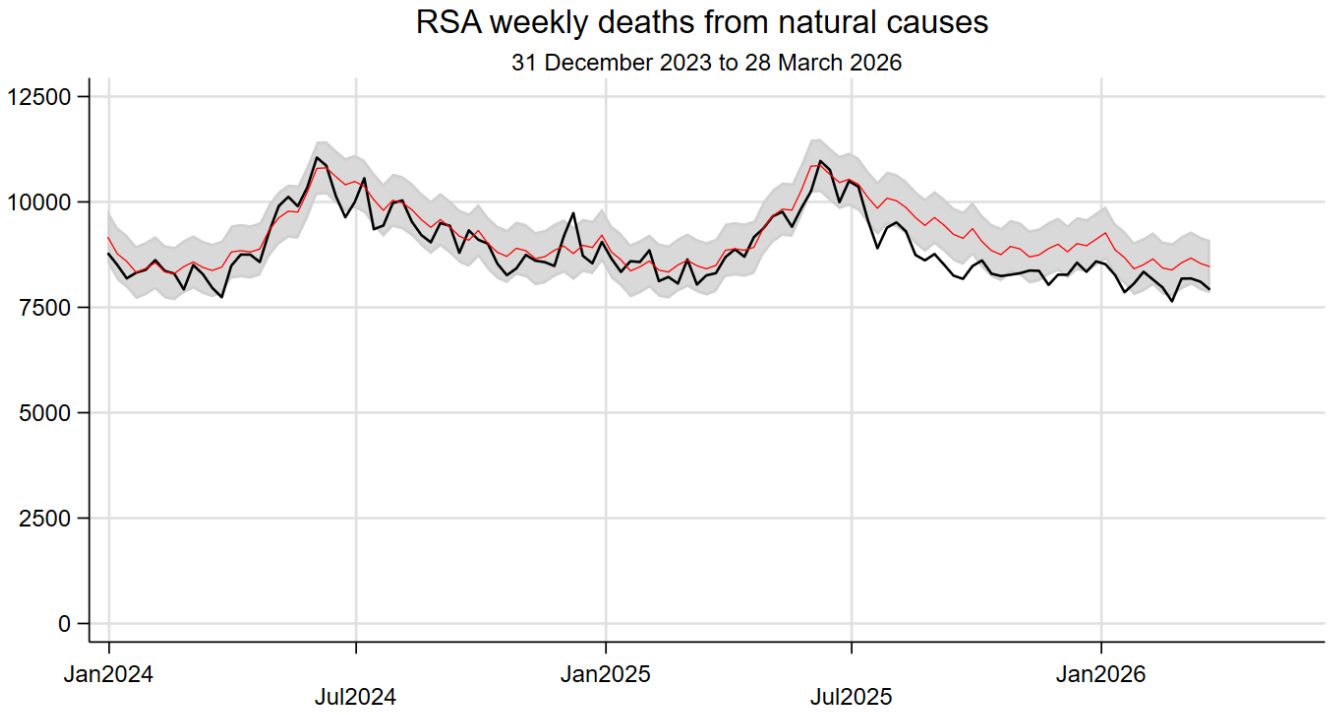
Natural and unnatural deaths





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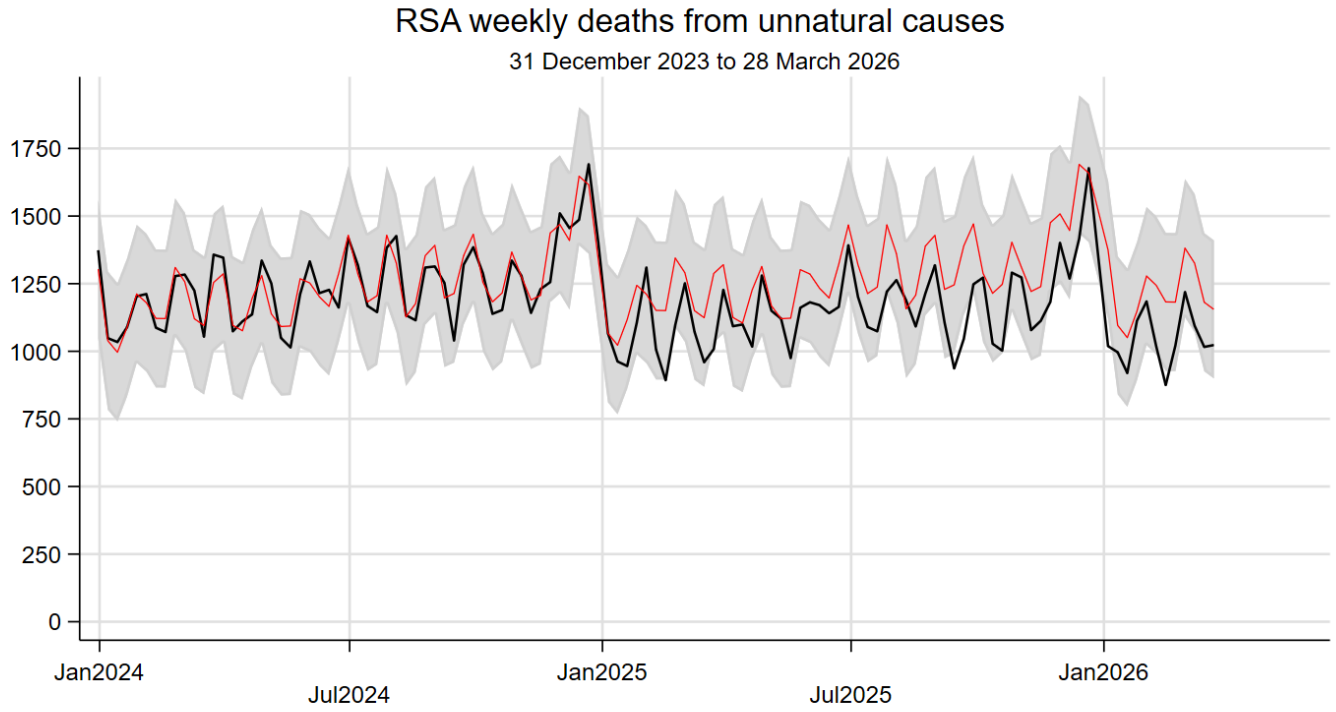

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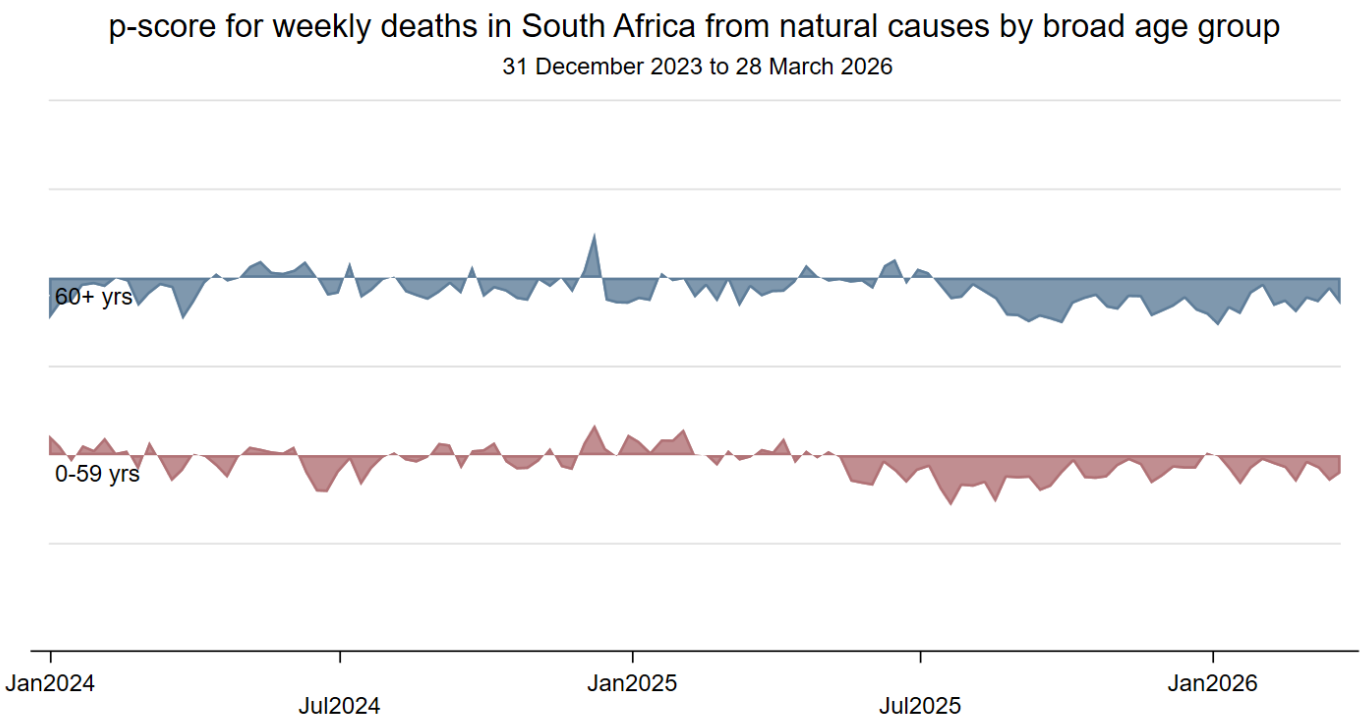
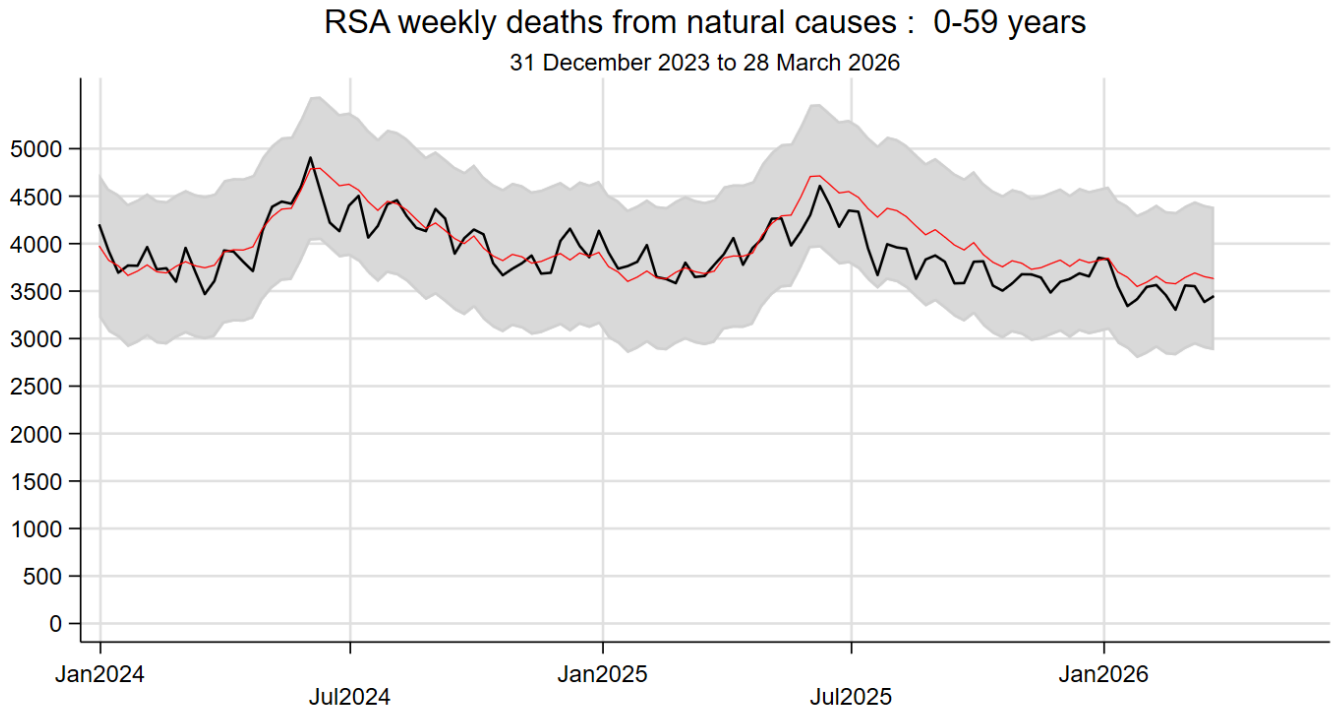
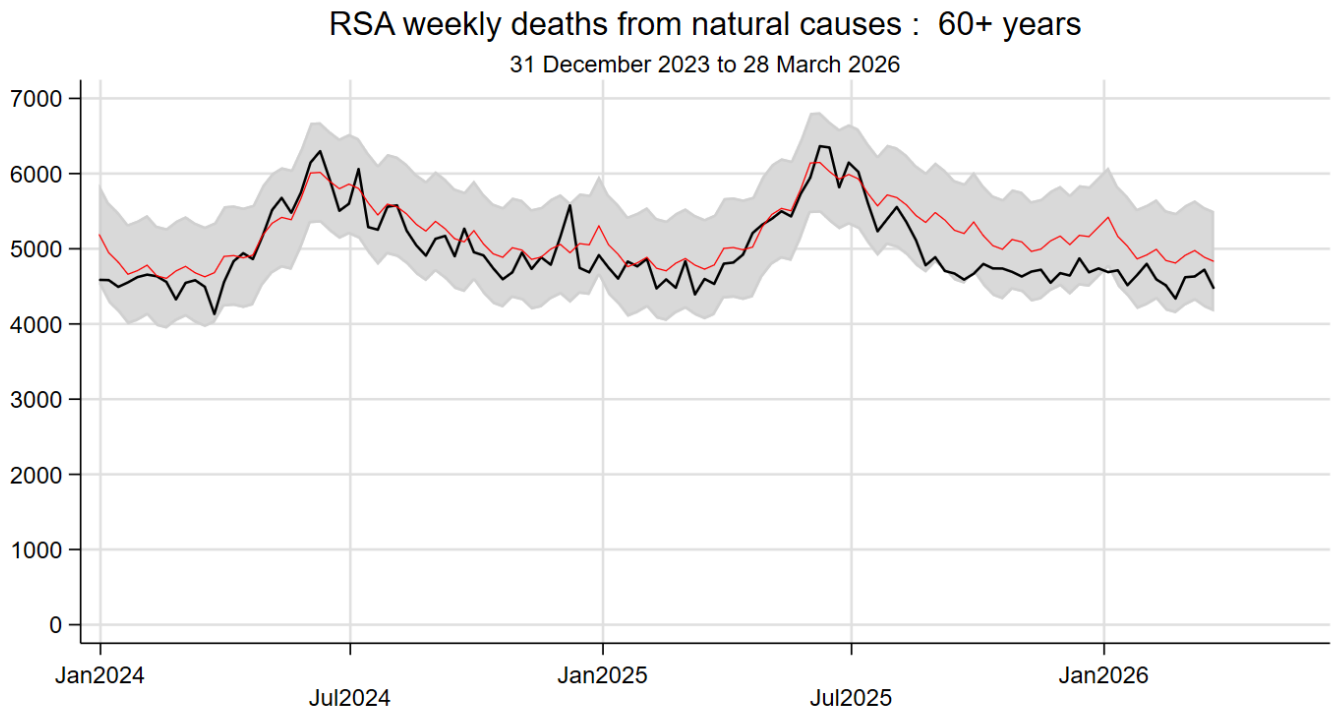
Natural deaths by broad age groups



Y-axis: each vertical increment represents 25% above or below predicted





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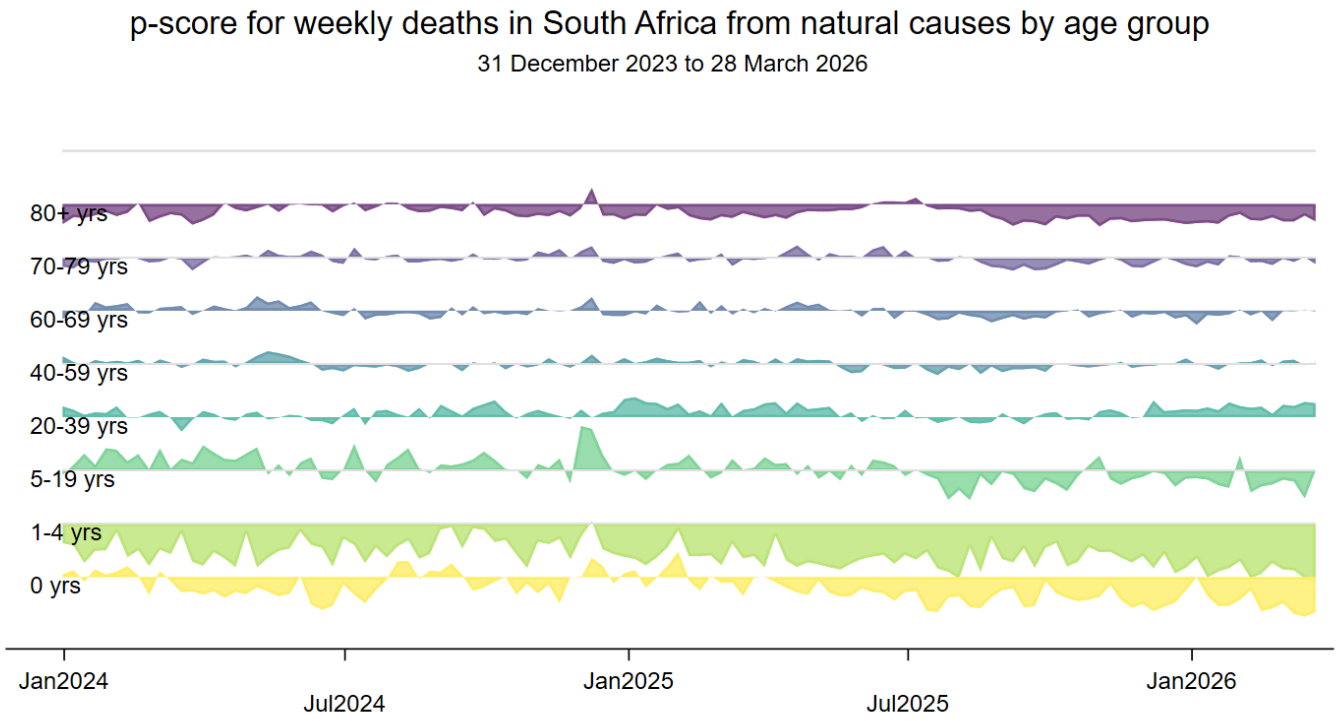
Natural deaths by age group



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RSA weekly deaths from natural causes, by age group

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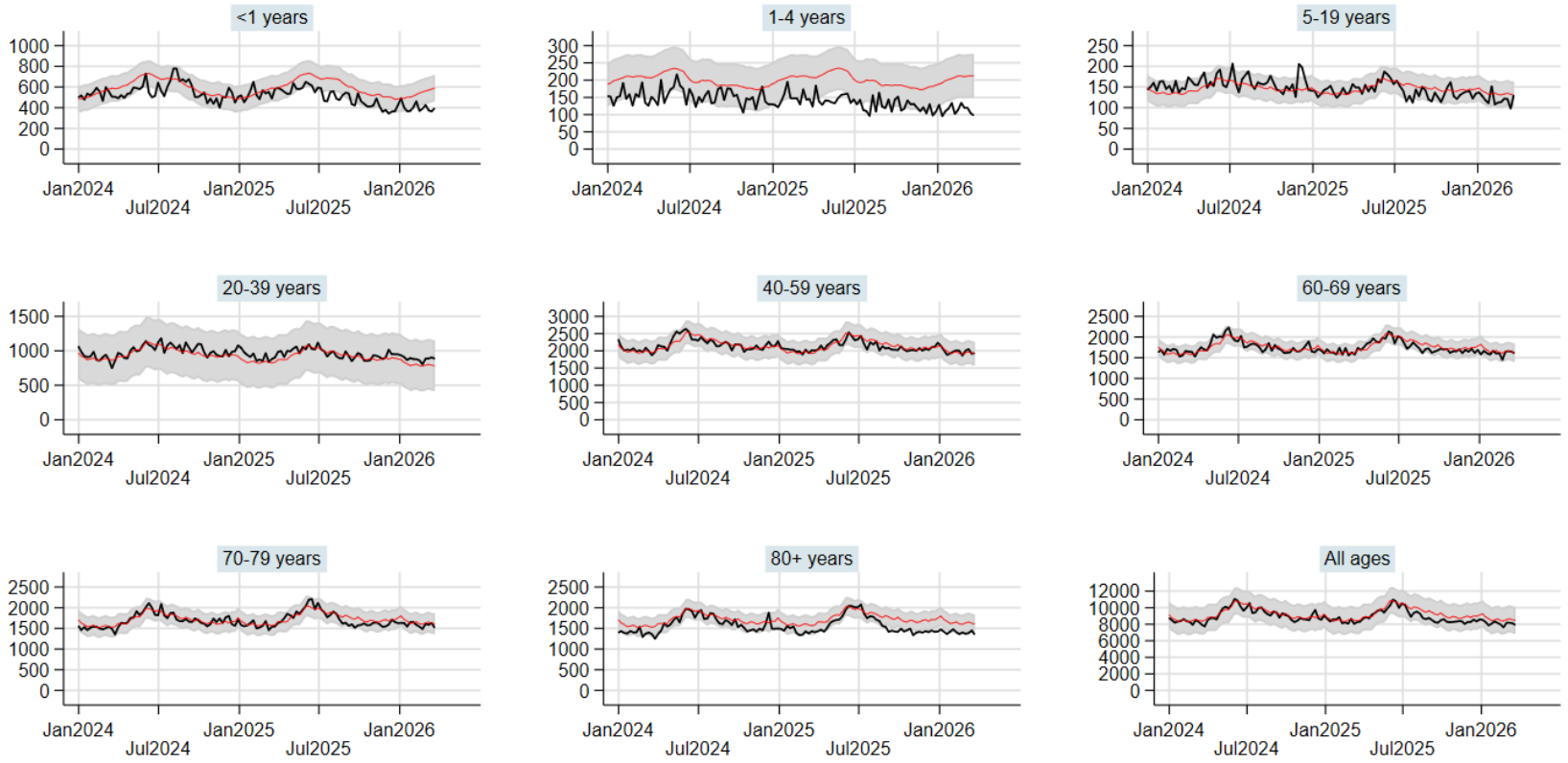

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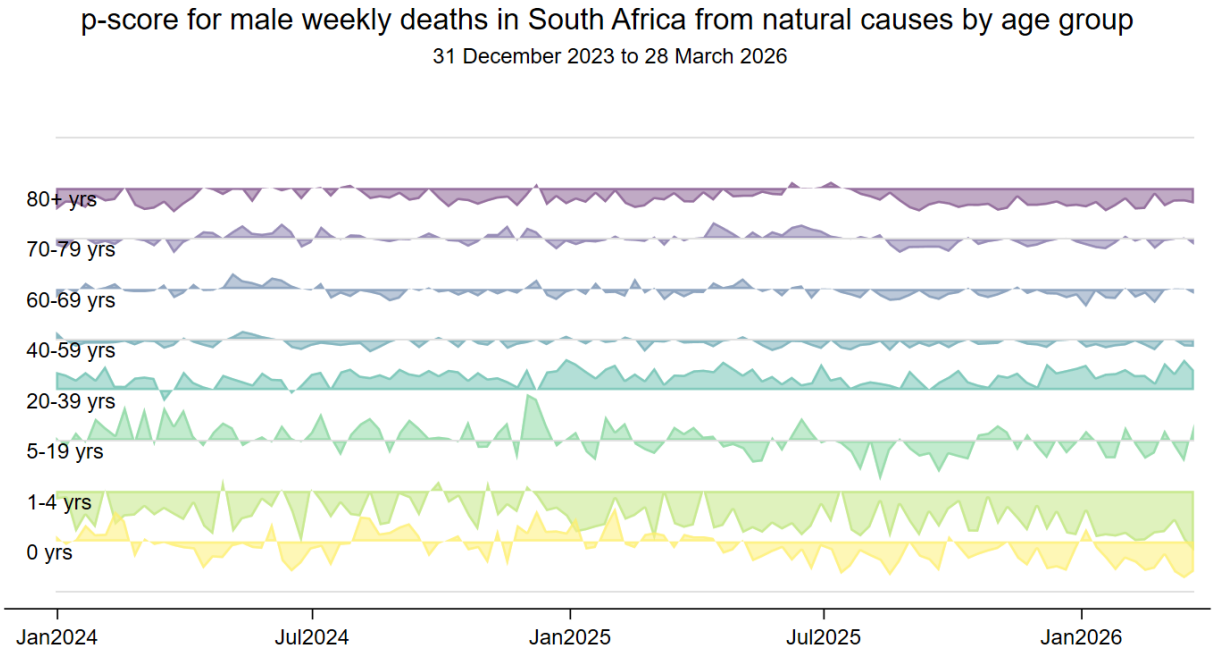
Natural deaths by sex and age group



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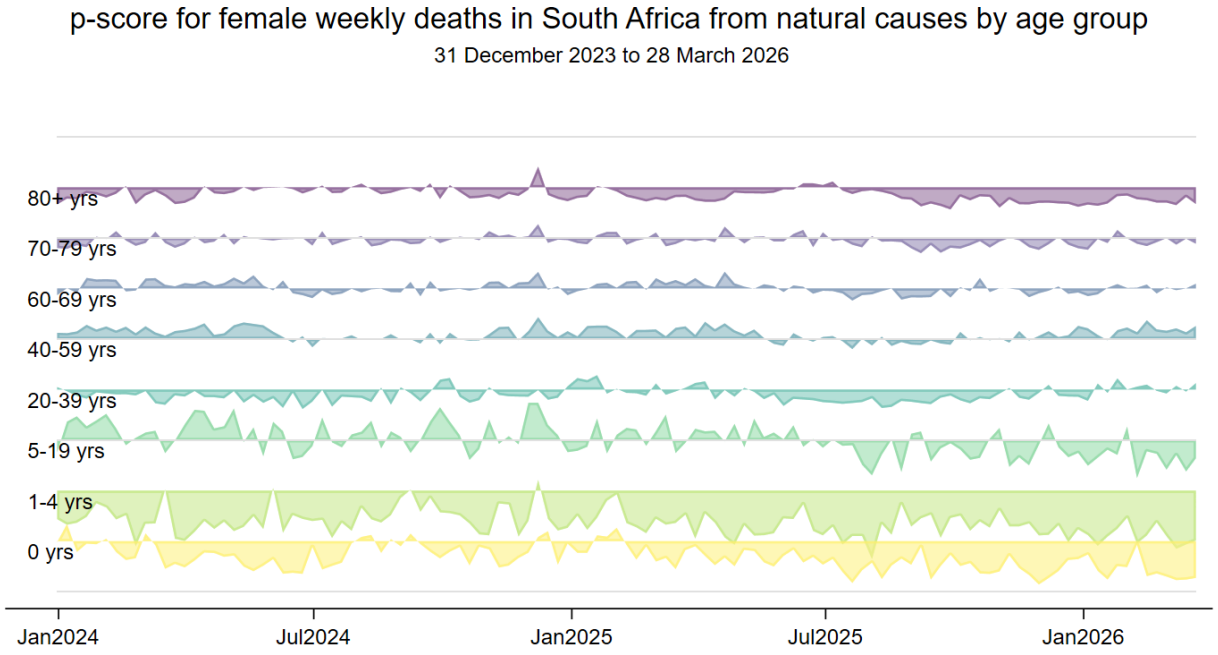

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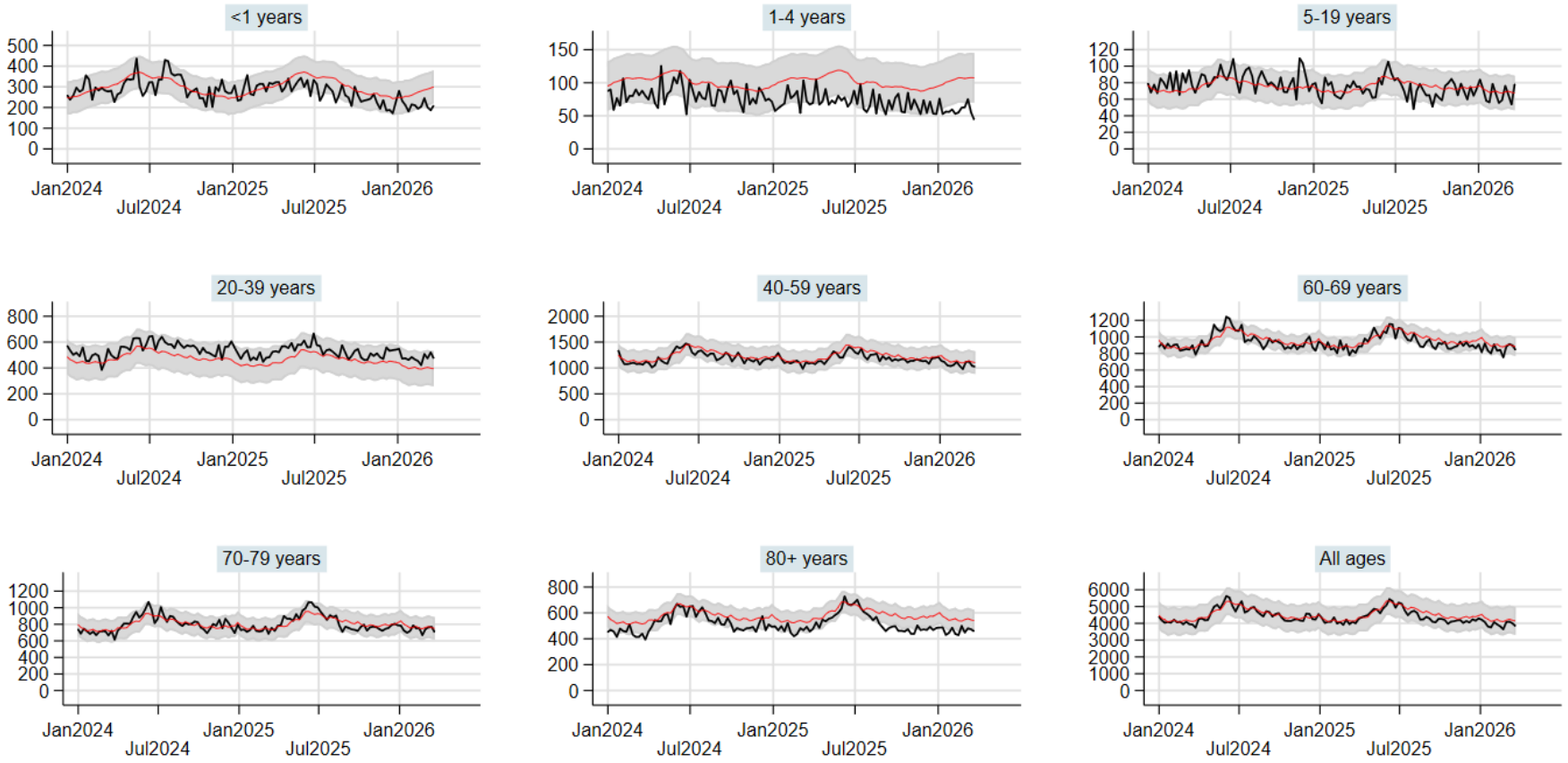
Males: Natural deaths, by age group

31 December 2023 to 28 March 2026



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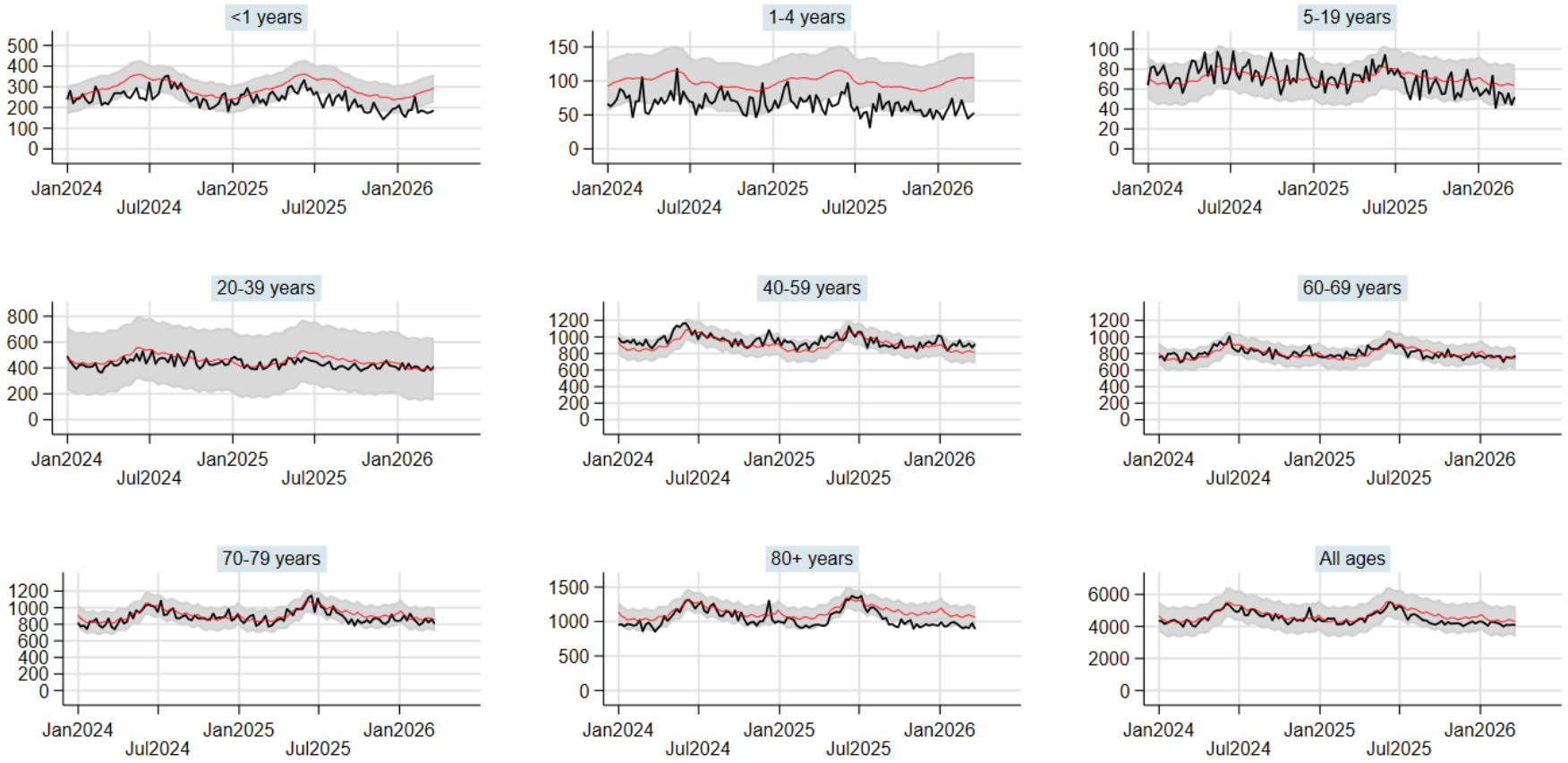
Females: Natural deaths, by age group

31 December 2023 to 28 March 2026



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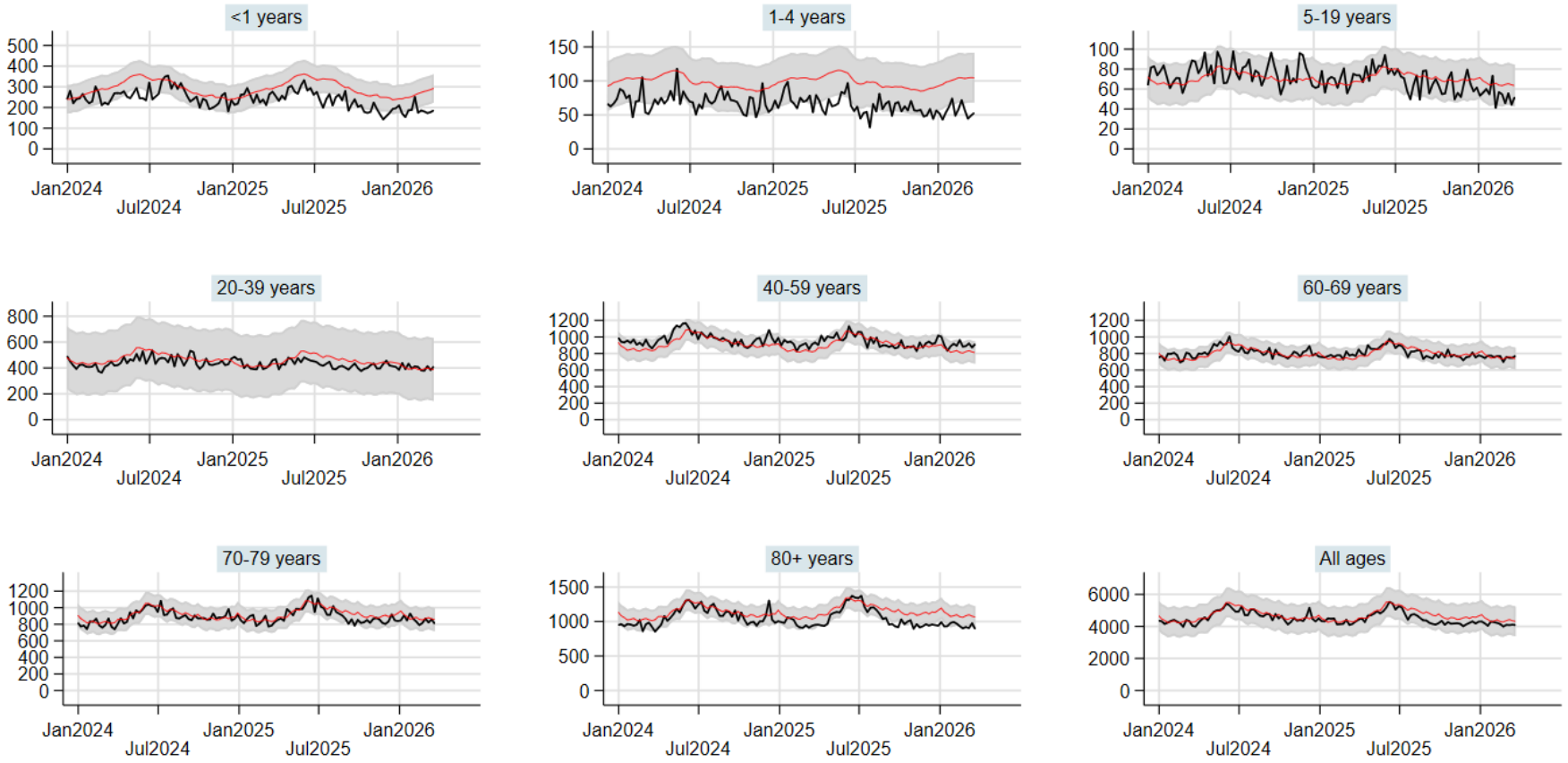
Females: Natural deaths, by age group

31 December 2023 to 28 March 2026



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