Supplemental Material 4. Adjusted hazard ratios for overall mortality according to corrected calcium levels.

|  |  |  |  |
| --- | --- | --- | --- |
| **Variables** | **Total** | **eGFR < 60 mL/min/1.732 m2** | **eGFR ≥ 60 mL/min/1.732 m2** |
| N | death | HR (95% CI) | P value | N | death | HR (95% CI) | P value | N | death | HR (95% CI) | P value |
| **Calcium categories\*** | < 2.5th | 226 | 50 | 1.09 (0.81 - 1.47) | 0.560 | 10 | 8 | 1.89 (0.88 - 4.04) | 0.102 | 216 | 42 | 1.05 (0.76 - 1.45) | 0.783 |
| 2.5th–25th  | 2,074 | 345 | 1.01 (0.87 - 1.17) | 0.907 | 97 | 48 | 0.88 (0.60 - 1.30) | 0.533 | 1,977 | 297 | 1.03 (0.88 - 1.20) | 0.737 |
| 25th–50th  | 2,333 | 388 | Referent | 116 | 60 | Referent | 2,217 | 328 | Referent |
| 50th–75th  | 2,089 | 411 | 1.15 (1.00 - 1.32) | 0.047 | 156 | 81 | 1.05 (0.75 - 1.48) | 0.757 | 1,933 | 330 | 1.14 (0.98 - 1.33) | 0.096 |
| 75th–97.5th  | 1,982 | 498 | 1.34 (1.17 - 1.53) | < 0.001 | 220 | 134 | 1.20 (0.88 - 1.64) | 0.249 | 1,762 | 364 | 1.29 (1.11 - 1.49) | 0.001 |
| >97.5th  | 223 | 65 | 1.61 (1.24 - 2.10) | < 0.001 | 42 | 25 | 1.35 (0.84 - 2.17) | 0.221 | 181 | 40 | 1.41 (1.01 - 1.96) | 0.041 |
| **Age** | **< 60 years** | 2,587 | 148 | Referent | 46 | 11 | Referent | 2,541 | 137 | Referent |
| **60 ~ 75 years** | 5,248 | 961 | 2.71 (2.27 - 3.23) | < 0.001 | 320 | 144 | 1.77 (0.95 - 3.32) | 0.074 | 4,928 | 817 | 2.63 (2.19 - 3.17) | < 0.001 |
| **≥ 75 years** | 1,092 | 648 | 10.37 (8.61 - 12.49) | < 0.001 | 275 | 201 | 3.95 (2.12 - 7.35) | < 0.001 | 817 | 447 | 9.99 (8.19 - 12.19) | < 0.001 |
| **Sex** | Male | 3,538 | 979 | Referent | 267 | 168 | Referent | 3,271 | 811 | Referent |
| Female | 5,389 | 778 | 0.51 (0.44 - 0.59) | < 0.001 | 374 | 188 | 0.55 (0.38 - 0.78) | 0.001 | 5,015 | 590 | 0.50 (0.42 - 0.59) | < 0.001 |
| **Education** | < 9 years | 3,967 | 962 | Referent | 373 | 219 | Referent | 3,594 | 743 | Referent |
| ≥ 9 years | 4,960 | 795 | 0.65 (0.58 - 0.72) | < 0.001 | 268 | 137 | 0.65 (0.50 - 0.84) | 0.001 | 4,692 | 658 | 0.65 (0.58 - 0.73) | < 0.001 |
| **Physical activity** | No | 3,265 | 705 | Referent | 310 | 183 | Referent | 2,955 | 522 | Referent |
| Yes | 5,662 | 1,052 | 0.83 (0.75 - 0.92) | < 0.001 | 331 | 173 | 0.85 (0.69 - 1.06) | 0.142 | 5,331 | 879 | 0.86 (0.77 - 0.96) | 0.009 |
| **Smoking status** | Never smoker | 6,116 | 923 | Referent | 396 | 201 | Referent | 5,720 | 722 | Referent |
| Former smoker | 1,850 | 579 | 1.46 (1.27 - 1.69) | < 0.001 | 164 | 107 | 1.31 (0.95 - 1.81) | 0.102 | 1,686 | 472 | 1.46 (1.24 - 1.72) | < 0.001 |
| Current smoker | 961 | 255 | 1.44 (1.21 - 1.7) | < 0.001 | 81 | 48 | 1.05 (0.72 - 1.53) | 0.806 | 880 | 207 | 1.46 (1.21 - 1.77) | < 0.001 |
| **Drinking status** | Never drinker | 4,018 | 752 | Referent | 357 | 195 | Referent | 3,661 | 557 | Referent |
| Former drinker | 803 | 250 | 1.11 (0.95 - 1.29) | 0.181 | 88 | 61 | 1.17 (0.84 - 1.63) | 0.352 | 715 | 189 | 1.11 (0.93 - 1.32) | 0.249 |
| Current drinker | 4,106 | 755 | 0.81 (0.72 - 0.91) | < 0.001 | 196 | 100 | 0.84 (0.63 - 1.12) | 0.243 | 3,910 | 655 | 0.85 (0.75 - 0.97) | 0.015 |
| **Categorized BMI** | Underweight  | 184 | 82 | 1.98 (1.58 - 2.49) | < 0.001 | 22 | 15 | 1.21 (0.69 - 2.11) | 0.505 | 162 | 67 | 2.21 (1.72 - 2.85) | < 0.001 |
| Normal | 5,127 | 1,089 | Referent | 332 | 205 | Referent | 4,795 | 884 | Referent |
| Overweight  | 3,324 | 539 | 0.78 (0.71 - 0.87) | < 0.001 | 247 | 119 | 0.71 (0.56 - 0.90) | 0.004 | 3,077 | 420 | 0.78 (0.69 - 0.88) | < 0.001 |
| Obesity  | 292 | 47 | 0.77 (0.58 - 1.04) | 0.091 | 40 | 17 | 0.61 (0.37 - 1.01) | 0.057 | 252 | 30 | 0.74 (0.51 - 1.07) | 0.109 |
| **Diabetes** | No | 7,767 | 1,380 | Referent | 478 | 256 | Referent | 7,289 | 1,124 | Referent |
| Yes | 1,160 | 377 | 1.63 (1.45 - 1.83) | < 0.001 | 163 | 100 | 1.33 (1.05 - 1.69) | 0.020 | 997 | 277 | 1.63 (1.43 - 1.87) | < 0.001 |
| **Hypertension** | No | 5,758 | 973 | Referent | 239 | 127 | Referent | 5,519 | 846 | Referent |
| Yes | 3,169 | 784 | 1.15 (1.05 - 1.28) | 0.005 | 402 | 229 | 1.08 (0.86 - 1.36) | 0.506 | 2,767 | 555 | 1.07 (0.96 - 1.20) | 0.213 |
| **Total cholesterol** | < 240 mg/dL | 7,483 | 1,511 | Referent | 528 | 296 | Referent | 6,955 | 1,215 | Referent |
| ≥ 240 mg/dL | 1,444 | 246 | 0.98 (0.85 - 1.13) | 0.781 | 113 | 60 | 1.01 (0.76 - 1.35) | 0.938 | 1,331 | 186 | 0.96 (0.82 - 1.12) | 0.585 |

eGFR = estimated glomerular filtration rate
Each model is adjusted for age, sex, education attainment, lifestyle (physical activity, smoking status, alcohol consumption and body mass index), comorbidities (hypertension and diabetes) and hypercholesterolemia.
\* p for interaction = 0.610