Supplementary Material

Statistical analysis

Mean values \pm SDs, as well as median values and range, were used for statistical description of continuous variables. Frequency and percentage were used for statistical description of categorical variables. Mortality was calculated in two ways: one way was as the number of deaths divided by the number of baseline TR patients; the other way was to estimate the cumulative survival probability using the Kaplan-Meier method. The log-rank test was used for comparison of two or more Kaplan–Meier curves. The Cox proportional hazards model was used to explore whether calcium, CorCa, phosphorus, or CaP had an impact on the survival process. The proportional hazards assumption was checked using statistical tests and graphical diagnostics based on the scaled Schoenfeld residuals. Given the number of events available, variables in the Cox models were carefully chosen with consideration of clinical relevance to ensure model parsimony. The following variables were considered: age, sex, hypertension history, smoking history, cardiomyopathy history, aortic disease history, symptoms, history of coronary heart disease (CAD), history of old myocardial infarction (MI), history of chronic obstructive pulmonary disease (COPD), left anterior descending coronary artery (LAD), left ventricular end-diastolic diameter (LVEDD), LVEF, and history of pulmonary hypertension (PH). To evaluate the association between CorCa and mortality risk, we initially assessed the shape of the association using penalized splines. All analyses were performed using the open source R program (version 4.2.0, https://www.r-project.org/), and the two-tailed significance level was set to 0.05.