**Supplementary Table 1.** Patient characteristics of included studies.

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Parameter** | **No of studies** | **Events/participants** | **Events** | **Heterogeneity between trials** | **P-value for****differences****across groups** |
| **Vitamin D supplementation** | **Non-vitamin D supplementation** | **OR** | **95%CI** | **P-value** | **I2 statistic** |
| Sex, male | 8 | 448/786 (57.0%) | 887/1,536 (57.7%) | 0.89 | 0.71, 1.12 | 0.32 | 14 % | 0.32 |
| ComorbiditiesDiabetesHypertensionCerebrovascular diseaseCardiovascular diseaseAsthma/COPDChronic kidney diseaseCancer | 7723644 | 153/770 (19.9%)173/339 (51.0%)5/96 (5.2%)20/156 (12.8%)84/720 (11.7%)32/696 (4.6%)44/583 (7.5%) | 230/1,504 (15.3%)606/1,145 (52.9%)34/484 (7.0%)43/343 (12.5%)172/1,478 (11.6%)72/995 (7.2%)85/1,332 (6.4%) | 0.830.850.810.960.690.631.08 | 0.49, 1.410.49, 1.460.32, 2.050.45, 2.020.51, 0.940.16, 2.510.61, 1.90 | 0.050.0030.480.300.480.130.26 | 51 %70 %0 %17 %0 %51 %25 % | 0.490.550.660.910.020.510.79 |

*Legend: CI, confidence interval; COPD, Chronic obstructive pulmonary disease; NA, not applicable; OR, Odds ratio*