

Vitamin C supplementation may have preventive effects in populations with a high incidence of pneumonia, and may have therapeutic effects in populations with low plasma vitamin C levels

Clinical question	Does vitamin C have a prophylactic or therapeutic effect in patients with/ at risk of pneumonia?
Bottom line	There is no evidence to support widespread prophylactic use of vitamin C to prevent pneumonia in the general population. However, therapeutic vitamin C supplementation may be reasonable for pneumonia patients who have low plasma vitamin C levels because its costs and risks are low.
Caveat	Several of the studies reviewed date from many years ago and were conducted in such extraordinary conditions e.g extreme cold that the results may not apply to the general population. There were 37 cases of pneumonia out of 2335 participants.
Context	Pneumonia is relatively common, particularly in young children and the aged. It is the most common cause of admission to hospital for adults in some developed countries
Cochrane Systematic Review	Hemilia H et al. Vitamin C for preventing and treating pneumonia . Cochrane Reviews, 2007, Issue 1. This review had 5 trials which contributed data to the review. The studies ranged from 226 to 1435 participants.
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