Evaluation of Oseltamivir Used to Prevent Hospitalization in Outpatients With Influenza: A Systematic Review and Meta-Analysis | Clinical Pharmacy and Pharmacology | JAMA Internal Medicine | JAMA Network

Of 2352 studies identified, 15 were included. The intention-to-treat infected (ITTi) population was comprised of 6166 individuals with 54.7% prescribed oseltamivir. Across study populations, 53.9% (5610 of 10 471) were female and the mean age was 45.3 (14.5) years. Overall, oseltamivir was not associated with reduced risk of hospitalization within the ITTi population (RR, 0.79; 95% CI, 0.48 to 1.29; RD, −0.17%; 95% CI, −0.23% to 0.48%). **Oseltamivir was also not associated with reduced hospitalization in older populations (mean age ≥65 years: RR, 1.01; 95% CI, 0.21 to 4.90) or in patients considered at greater risk of hospitalization (RR, 0.65; 0.33 to 1.28)**. Within the safety population, oseltamivir was associated with increased nausea (RR, 1.43; 95% CI, 1.13 to 1.82) and vomiting (RR, 1.83; 95% CI, 1.28 to 2.63) but not serious adverse events (RR, 0.71; 95% CI, 0.46 to1.08).

Conclusion:

**Based on the available RCT data in this systematic review and meta-analysis, there is a lack of convincing evidence that oseltamivir reduces serious complications in outpatients with influenza,** although its use is associated with an increase in nonsevere gastrointestinal adverse events. This meta-analysis provides important data for clinicians, patients, and policy makers to contextualize the evidence and inform guidelines. Future research should focus on the conduct of an adequately powered placebo-controlled trial in a suitably high-risk population.