Cochrane Review Abstract sections with explanations

(Based on a fictitious review 'Drug A for treating influenza in adults')

Cochrane Training

Background

Drug A has antiviral properties, but it is not widely used due to incomplete knowledge of its properties and concerns about possible adverse effects. This is an update of a Cochrane Review first published in 2006, and previously updated in 2016.

ℹ The **Background** should explain the context and rationale of the review in a couple of sentences. This is usually based on a problem, with a potential intervention or solution to the problem.

Objectives

To assess the effects of drug A in adults with influenza.

ℹ The **Objectives** should generally be a single sentence, usually the same as in the full review, often a restatement of the title of the review, unless there are critical aspects to your question that need to be included.

Search methods

We searched the Cochrane Acute Respiratory Infections Group Specialized Register (15 February 2021), the Cochrane Central Register of Controlled Trials (The Cochrane Library Issue 1, 2021), MEDLINE (January 1966 to January 2021), EMBASE (January 1985 to December 2020) and reference lists of articles. We also searched trials registries and contacted manufacturers.

ℹ The **Search methods** should briefly list the sources, date ranges, and limits used in your search.

Selection criteria

Randomized studies comparing drug A with placebo in adults with suspected or confirmed influenza. Our critical outcomes were duration of fever, symptomatic recovery and hospital admission.

ℹ The **Selection criteria** should be clearly stated, again often in a single sentence – e.g. [type of study] of [type of intervention or comparison] in [type of people]. Don't list the outcomes here unless they were used as part of your eligibility criteria.

Data collection

Two authors independently assessed trial quality and extracted data. We contacted study authors for additional information. We collected adverse effects information from the trials and assessed the certainty of evidence for key outcomes using GRADE.

ℹ **Data collection** is a very brief statement of how data were collected, steps taken to collect missing data (including contacting investigators to obtain missing information). This should not be a list of all the data you collected.

Main results

We included 17 trials involving 1689 people. The studies were conducted in both hemispheres during influenza seasons between 1991 and 2018. They primarily recruited community-dwelling adults. Overall the studies were at a low risk of bias, but there was some evidence of bias due to missing outcome data in six small trials.

There is high certainty evidence that drug A shortens duration of fever by 1 day (95% confidence interval 0.73 to 1.29), a reduction from 8 days to 7 days. The effect of A on symptomatic improvement was uncertain due to variation in the study results and wide confidence intervals (OR 0.96 (95% CI 0.4 to 4.5), very low certainty evidence). Based on 11 trials of 1073 people, central nervous system effects are probably more common with A than placebo, increasing from an assumed rate of 11 per 1000 on placebo to 27 per 1000 (RR 2.58, 95% confidence interval 1.54 to 4.33; moderate certainty evidence). No studies measured quality of life. The risk of admission was low in the study populations. There was one reported admission to hospital in each treatment group based on 7 studies of 965 people (RR 0.98 (95% CI 0.2 to 6), very low certainty evidence).

Authors' conclusions

Drug A reduces duration of fever in community dwelling adults who are at low risk of admission to hospital, but it likely increases risk of central nervous system effects. There is uncertainty over the effects of A on symptomatic improvement and no evidence was found that measured quality of life. Three large ongoing studies are likely to report findings on most outcomes of interest in this review.

In **Main results**, you should give a brief statement on the context for interpreting your results, including the overall risk of bias and comparability of studies. If risks of bias differ substantially for different comparisons and outcomes, this should be mentioned. You should then give the results for the main outcomes as specified in the protocol, including adverse effects.

Specify numbers of studies and participants, as well as the certainty of evidence for all outcomes. Make sure when you give your results that you give both the numerical results (if there's a meta-analysis or a single study), as well as a narrative interpretation, to ensure that readers unfamiliar with statistics still get your message. Do not emphasize statistical significance, but describe the results in terms of magnitude, direction, and certainty. If you're giving numerical results, make sure they're the same as in the full review, with a confidence interval. You may wish to present both absolute and relative effects to assist understanding. Convert any standardized mean differences to more meaningful units on a scale.

Use standard narrative statements for describing the results of the review, based on the effect size and certainty of the evidence.

The **Authors' conclusions** are a briefer version of those in the full review – mainly focusing on the implications for practice. As in the full review, avoid recommendations and assumptions about the values and context in which the results of the review might be implemented. Make sure your conclusions are directly supported by the review and reflect the certainty of the evidence. Note any important limitations. Include implications for research only if they are not obvious.