The clinical effectiveness and cost-effectiveness of treatments for idiopathic pulmonary fibrosis: a systematic review and economic evaluation

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Plain English summary

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Plain English summary

Idiopathic pulmonary fibrosis (IPF) is a serious lung condition of unknown cause that scars and stiffens the lung tissue; it generally affects people over 60 years old. The main symptoms are shortness of breath and a cough, and as the disease progresses there is a considerable impact on day-to-day life. Few treatments are available. We evaluated the benefits and harms of available treatments by considering the most up-to-date, high-quality evidence, using a systematic approach. Searches for evidence from 11 databases were made and evidence was reviewed by two authors, using predefined criteria, to consider its relevance. All included studies were assessed for their quality, and data from each study were extracted into a standardised template. A narrative review and statistical methods to combine study data were applied. A statistical model was developed to compare the cost-effectiveness of pharmacological interventions for the treatment of IPF. Standard methods were used.

Fourteen studies were included in the review of clinical effectiveness. These evaluated six drugs and three non-pharmacological interventions. Results were mixed. There are few treatments which have a significant benefit. Harms from these treatments were not significant in most cases. Treatments are unlikely to be considered cost-effective. There were few studies on interventions in symptom management and palliative care. Further research is required in a number of areas including the effects of symptom control interventions and an inhaled therapy. A number of ongoing studies are yet to report and these may provide further evidence for the best approach to take for treating IPF.

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