

## Remdesivir cost effective for severe COVID-19 in China

Remdesivir given for 5 days is a cost-effective treatment for patients hospitalised with severe COVID-19 in China, according to a study published in the *British Journal of Clinical Pharmacology*.

The study used a dynamic compartment transmission model to evaluate the cost effectiveness of remdesivir given for 5 days, compared with standard of care, for the treatment of patients hospitalised with severe COVID-19. The base-case analysis assumed an acquisition cost of ¥16 600 (\$US2340) for the 5-day remdesivir treatment course. The analysis was conducted from the perspective of the healthcare system in China.

The model projected that 5 days of treatment with remdesivir was associated with a net gain of 6947 quality-adjusted life-years (QALYs) over the 55-day time horizon at an incremental cost of ¥97.93 million (year 2020 value). The incremental cost-effectiveness ratio for remdesivir was ¥14 098 per QALY gained. This value is substantially lower than the commonly accepted cost-effectiveness threshold of  $1 \times$  GDP per capita per QALY gained (¥70 892 [\$US10 276] in China in 2019). Furthermore, the maximum number of severe cases per day was substantially lower for the remdesivir strategy, compared with standard of care (8163 vs 10 082), corresponding to 19% lower hospital-bed requirement to accommodate all severe cases. The results were robust in alternative epidemiological scenarios but were sensitive to changes in effectiveness estimates. A probabilistic sensitivity analysis showed that the 5-day remdesivir regimen had a 98% probability of being cost effective. "Ensuring access to remdesivir in China may benefit the healthcare system when confronted with potential re-surges," conclude the researchers.

Jiang Y, et al. Economic evaluation of remdesivir for the treatment of severe COVID-19 patients in China under different scenarios. *British Journal of Clinical Pharmacology* : 14 Apr 2021. Available from: URL: <http://doi.org/10.1111/bcp.14860> 803558169