

Antibiotics may not help patients hospitalised with viral infections

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Online Desk: Most patients admitted to hospitals with acute viral infections are given antibiotics as a precaution against bacterial co-infection, but this practice may not improve survival, new research suggests. Researchers investigated the impact of antibiotic use on survival in more than 2,100 patients in a hospital in Norway between 2017 and 2021 and found that giving antibiotics to people with common respiratory infections was unlikely to lower the risk of death within 30 days.

At the height of the pandemic, antibiotics were prescribed for around 70% of COVID-19 patients in some countries, potentially contributing to the scourge of antibiotic-resistant pathogens known as superbugs, according to Reuters reports. This new data, which has not been published in a medical journal, suggests there is “a huge overuse of antibiotics,” said lead author Dr Magrit Jarlsdatter Hovind from Akershus University Hospital and the University of Oslo, Norway.

The overuse and misuse of antibiotics has helped microbes become resistant to many treatments, which development scientists consider one of the greatest threats to global health, given the pipeline of replacement therapies in development is alarmingly sparse. This latest research, which will be presented at next month’s European Congress of Clinical Microbiology & Infectious Diseases in Copenhagen, involved patients who tested positive via nasal or throat swab for viral infections such as the flu, RSV or COVID-19. Those with confirmed bacterial infections were excluded from the analysis.

In total, 63% of the 2,111 patients received antibiotics for respiratory infection during their hospital stay. Overall, 168 patients died within 30 days, of which only 22 had not been prescribed antibiotics. After accounting for factors including sex, age, severity of disease and underlying illnesses among patients, the researchers found those prescribed antibiotics during their hospital stay were twice as likely to die within 30 days than those not given antibiotics.

The research team noted that the sicker patients and those with more underlying illnesses were both more likely to get antibiotics and to die. Other factors such as patients’ smoking status could have also played a role, they said. “Doctors have to dare to not give antibiotics, instead of doubting and giving antibiotics just in case,” Hovind said. Given the limitations of a retrospective study such as this one, a clinical trial, which Hovind and colleagues recently initiated, is necessary to determine whether patients admitted to hospital with common respiratory infections should be treated with antibiotics, she said.