Dialysis patients have four-fold greater risk of dying from COVID-19

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People undergoing long-term dialysis are almost 4 times more likely to die from COVID-19 and should be prioritized for vaccination, found a new Ontario study published in CMAJ (Canadian Medical Association Journal).

"As the COVID-19 pandemic proceeds, focused efforts should be made to protect this population from infection including prioritizing patients on long-term dialysis and the staff treating them for SARS-CoV-2 vaccination," writes Dr. Peter Blake, provincial director, Ontario Renal Network, Ontario Health, and professor, Schulich School of Medicine and Dentistry, Western University, London, Ontario, with coauthors.

The study looked at data on 12 501 patients undergoing long-term dialysis in Ontario between March 12 and August 20, 2020, of whom 187 (1.5%) were diagnosed with SARS-CoV-2 infection. Of these, 53 people (28.3%) died and 117 (62.6%) were admitted to hospital. By contrast, uninfected people who were receiving dialysis during that period had a death rate of 5.8% and a hospitalization rate of 27%. Since this analysis and particularly in the last two months, the number of people on dialysis infected with the virus has risen to over 570 and the number of deaths has increased to 120.

Risk factors for SARS-CoV-2 infection in people on dialysis include hemodialysis at a hospital facility as compared to home dialysis; living in long-term care; living in the Greater Toronto Area; Black, Indian subcontinent and other non-White ethnicity; and lower income.

In addition to vaccination and infection precautions, the authors recommend educating patients about their increased risk of infection and higher mortality, including risks associated with social activities. Paid sick leave should be available for those in high-risk occupations. Other strategies should include a low symptom threshold for testing, more space between treatment stations in dialysis units, and regular testing of high-risk groups, such as those living in long-term care.


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