

Vaccination status of COVID-19 cases admitted to ICU between 1st April 2021 and 11th September 2021

Key points

Between April 1st and September 11th 2021:

- 301 persons (aged 15 + years) were reported to the Health Protection Surveillance Centre (HPSC) as admitted to ICU with confirmed COVID-19 infection.
- 217/301 (72%) cases reported as not having received a COVID-19 vaccine or were not registered as vaccinated on Ireland's national COVID-19 immunisation system (COVAX).
- 84/301 (28%) cases were reported as having received at least one dose of a COVID-19 vaccine prior to admission to ICU.
- 51/301 (17%) cases were vaccine breakthrough infections (had an epidemiological date¹ 14 days or more after receiving all recommended doses of vaccine – see technical note).

Three hundred and one persons (aged 15+ years) with confirmed COVID-19 infection were admitted to ICU between April 1st and September 11th 2021 and reported to the national Computerised Infectious Disease Reporting (CIDR) system at HPSC. Of these 301 cases, 217 (72%) were reported as not having received a COVID-19 vaccine or were not registered as vaccinated on Ireland's national COVID-19 immunisation system (COVAX). Eighty-four cases (28%) were reported as having received at least one COVID-19 vaccine prior to ICU admission.

Fifty-one people had an epidemiological date of COVID-19 infection 14 days or more after receiving all recommended doses of a COVID-19 vaccine. Therefore, there are fifty-one breakthrough infections¹ identified in the vaccinated cohort of COVID-19 patients admitted to ICU between April 1st and September 11th, 2021.

Of these fifty-one individuals:

- 31 were male and 20 were female
- Median age was 67 years (range: 30 to 86 years); Mean age was 65 years
- 49 cases (96%) were reported to have an underlying medical condition
- 10 cases (20%) were reported to have died

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(CIDR data extracted at 14.30pm on 13.09.2021)

¹ See technical notes for a definition of epidemiological date and vaccine breakthrough

Acknowledgements

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Technical notes

1. Data Source

Data were extracted from CIDR on 13.09.2021 at 14:30pm and were correct at that time. Data may change in future reports as further review and validation are carried out.

2. Definition of COVID-19 vaccine breakthrough infection for surveillance purposes

In Ireland, the Health Protection Surveillance Centre (HPSC), for the purposes of surveillance of COVID-19 vaccine breakthrough infections, has defined a COVID-19 infection in a fully vaccinated individual as a laboratory confirmed SARS-CoV-2 infection in a person ≥ 14 days after they have completed all recommended doses of a COVID-19 vaccine. Epidemiological date (epi date) is used to determine timing of SARS-CoV-2 infection. Epi date is based on the earliest of dates available on the case and taken from date of onset of symptoms, date of diagnosis, laboratory specimen collection date, laboratory received date, laboratory reported date or event creation date/notification date reported on Ireland's Computerised Infectious Disease Reporting System (CIDR). This definition is in line with those used internationally for COVID-19 vaccine breakthrough infection.

3. Vaccine brand

This report does not include information on vaccine brand. Ireland has received and administered more of some vaccine brands than others and additionally, each vaccine has a different dosing schedule so some people reach their 14th day after vaccination more quickly than others. These factors make it difficult to directly compare by vaccine brand.