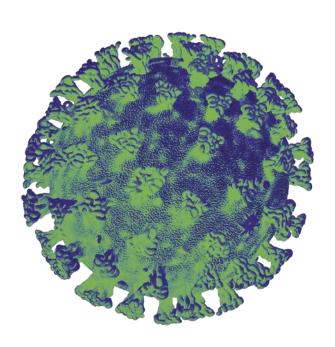
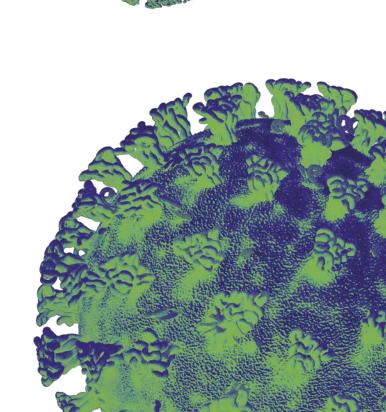


Science Evidence Advice (SEA)

Summary of Advice

07 October 2022





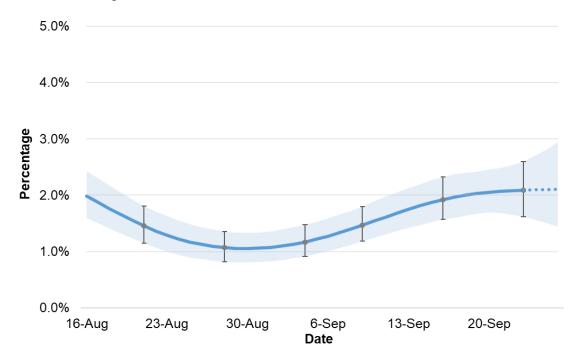
Top Line Summary

- In the latest ONS positivity update, the trend in the percentage of people testing positive in Wales was uncertain in the most recent week, however the trend increased over two weeks. It is estimated that around 1 in 50 people in Wales had COVID-19. The positivity rate has increased in Northern Ireland and England. The trend in the percentage of people testing positive in Scotland was uncertain.
- Wastewater surveillance indicates the overall SARS-CoV-2 viral load has increased across the country. The signal increased in 10 regions, decreased in 2 regions and remained level in 2 regions.
- PHW lateral flow test data in the latest week (26/09/2022 to 02/10/2022) shows the number of LFTs reported increased from 17,761 in the previous week to 18,145 in the latest reporting week, the number of positive testing episodes increased from 2,778 in the previous week to 3,402 in the latest reporting week.
- As of 4 October 2022, hospital admissions of suspected and confirmed COVID-19 positive patients increased to approximately 18 admissions per day.
- Deaths in confirmed COVID-19 cases in hospital, reported by clinicians through PHW mortality rapid surveillance, remain at lower levels compared to previous waves. ONS surveillance data reports that 17 deaths involving COVID-19 were registered in the latest week. This was 3.2% of all deaths, and 3 less than the previous week.
- The PHW COVID-19 variants update (5 October) notes that in the latest four reporting weeks Omicron BA.5 remained dominant in Wales, accounting for 88% of sequenced cases.

1. Wales Situation Update

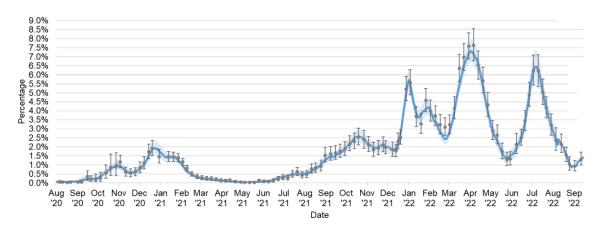
Infections

- According to the ONS Coronavirus Infection survey, for the week 20 to 26 September 2022 the trend in the percentage of people testing positive for COVID-19 in Wales is uncertain. It is estimated that 2.09% of the community population had COVID-19 (95% credible interval: 1.62% to 2.60%). This equates to approximately 1 person in every 50 (95% credible interval: 1 in 60 to 1 in 40), or 63,400 people during this time (95% credible interval: 49,200 to 78,900).
- Caution should be taken in over-interpreting small movements credible intervals are provided to indicate the range within which we may be confident the true figure lies.



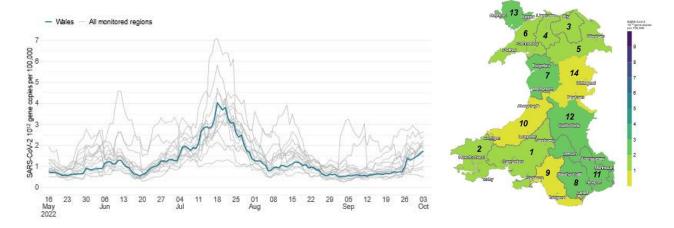
Wales, estimated % testing positive for Covid 19 since August 2020

Source: Coronavirus (COVID-19) Infection Survey, ONS, 05/10/22



Wastewater surveillance

 <u>Wastewater surveillance</u> suggests the overall SARS-CoV-2 viral load has increased across the country. However, the signal decreased at Teifi and North Ceredigion and Ynys Môn, and remained level at Conwy and Llŷn and Eryri.



PHW Lateral Flow Testing Surveillance

- As of 1 August 2022, free NHS lateral flow tests (LFTs) in Wales have not been available to members of the public showing symptoms of coronavirus or who are visiting someone eligible for new COVID-19 treatments. As a result, testing data will be incomplete and should be interpreted with caution, although it may still be useful to signal wider trends.
- In the <u>latest reporting week</u> (26/09/2022 to 02/10/2022) the number of LFTs reported increased from 17,761 in the previous week to 18,145 in the latest reporting week, the number of positive testing episodes increased from 2,778 in the previous week to 3,402 in the latest reporting week.
- The episode positivity rate increased from 21.63% in the previous week to 26.04% in the latest reporting week. The 40-59 age group recorded the highest incidence rate of 160.8 positive testing episodes per 100,000 population. The Under 20 age group recorded the highest episode positivity rate of 40.43%.

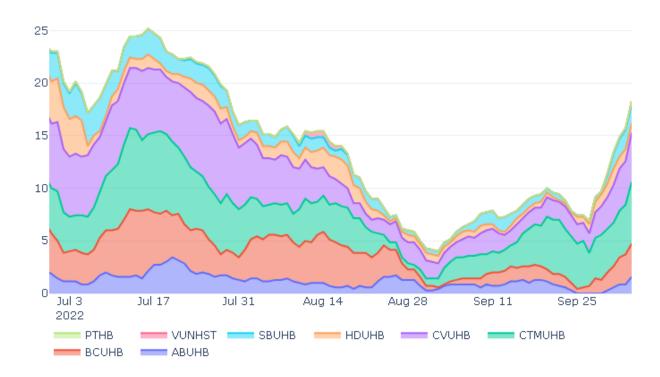
Deaths

- The most recent PHW <u>COVID-19 weekly surveillance and epidemiological summary</u> reports that deaths in confirmed COVID-19 cases in hospital, reported by clinicians through PHW mortality rapid surveillance, remain at lower levels compared to previous waves.
- The Office for National Statistics (ONS) published statistics on 4 October on provisional weekly deaths, including deaths involving COVID-19, for the week ending 23 September 2022. The cumulative number of deaths involving COVID-19 in Wales, occurring throughout the pandemic up to the latest week, was 10,833.
- 537 deaths from all causes were registered in the latest week. This was 119
 less than the previous week and is 69 less than the five-year average for
 2016-19 and 2021. This week's registrations were likely impacted by the bank
 holiday for the Queen's funeral Monday 19 September 2022.
- 17 deaths involving COVID-19 were registered in the latest week. This was 3.2% of all deaths, and 3 less than the previous week. As above, the current week included a bank holiday which may have impacted registrations.

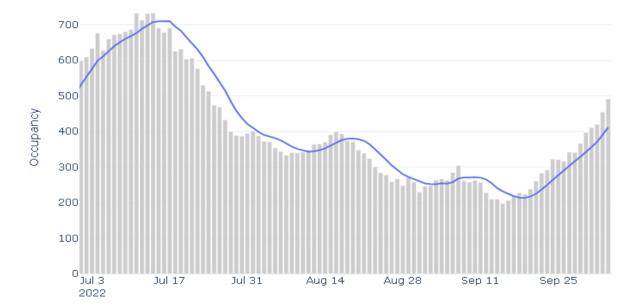
NHS

 As of 4 October 2022, hospital admissions of suspected and confirmed COVID-19 positive patients increased to approximately 18 admissions per day. Admissions have been steadily increasing since 27 September 2022 and currently sit at just over two thirds of the mid-July peak. Admissions are highest in CTM Health Board.

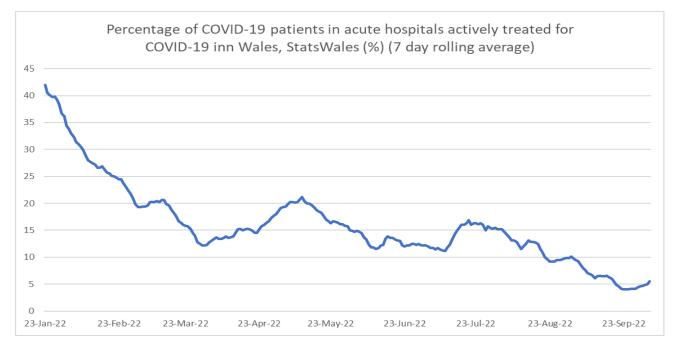
Hospital admissions of suspected and confirmed COVID-19 positive patients



As of 4 October 2022, the 7-day average of hospital bed occupancy of confirmed COVID-19 patients was 412 beds, an increase of almost 200 beds compared with 2 weeks prior. Confirmed COVID-19 hospital occupancy in Wales (7-day average) reached a peak of over 700 in mid-July 2022, roughly three quarters of the maximum occupancy peak level in March 2022 when BA.2 was dominant.



 The proportion of patients in hospital with COVID-19 who are being actively treated for COVID-19, as opposed to testing positive for COVID-19 but being primarily treated for other reasons, has been generally decreasing since mid-July.



 NHS staff absence figures up to 3 October 2022 show absence due to selfisolation has increased compared with the period ending 20 September 2022 to 0.4%, whilst absence due to COVID-19 sickness has increased to 0.7%.

Vaccines

• The Autumn booster campaign is under way, as outlined in these tables:

Cumulative number of Autumn 22/23 doses given, by week. Uptake, based on Wales residents, uses indicative denominator 1,608,231

| Week ending | Number of doses | Uptake |
|-------------|-----------------|--------|
| 2022-09-04 | 23,318 | 1.4% |
| 2022-09-11 | 91,520 | 5.7% |
| 2022-09-18 | 155,468 | 9.7% |

Data for this report were extracted at 8am 22/09/2022

 $\label{lem:source:https://public.tableau.com/app/profile/public.health.wales.health.protection/viz/COVID-19 vaccination-\\ \underline{Public/Vaccination?publish=yes}$

Number of COVID-19 Autumn 22/23 booster immunisations given by age and risk group

| Risk group | Denominator *(n) | Immunised (n) - 22/23 Booster | Uptake(%) - 22/23 Booster |
|-------------------------|------------------|----------------------------------|------------------------------|
| Severely | | | |
| Immunosuppressed | 51,242 | 12,703 | 24.8 |
| Residents in a care | | | |
| home for older | | | |
| adults* | 14,139 | 8,137 | 57.6 |
| Staff working in care | | | |
| homes for older | | | |
| adults** | 38,205 | 6,637 | 17.4 |
| Health care staff** | 141,426 | 13,497 | 9.5 |
| Social care staff** | | 7,285 | |
| All adults aged 65 | | | |
| years and older | 712,848 | 133,800 | 18.8 |
| Aged 5 to 49 years in a | | | |
| clinical risk group | 218,335 | 2,988 | 1.4 |
| All adults aged 50 to | | | |
| 64 years | 677,048 | 33,623 | 5 |

An individual will be counted more than once if they are in more than one risk group.

Denominator data is taken from WIS and based on Wales residents, with the exception of care home workers, healthcare workers and social care workers where denominators are based on those working in Wales.

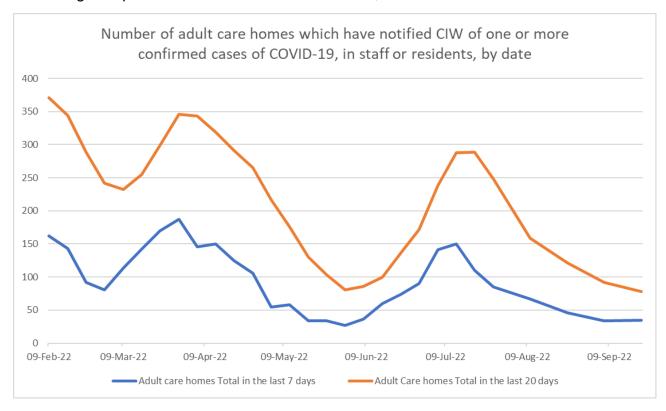
All age groups are based on age as at 31 March 2022.

Quality of recording of staff priority groups is variable and incomplete, these figures are provided provisionally and should be interpreted with caution.

Care home residents have been identified by matching address as recorded in the Welsh Demographic Service (WDS) to a Care Inspectorate Wales list of registered Care Homes.

Care homes

• As of 21 September 2022, the number of adult care homes in Wales that have notified CIW of one or more confirmed cases of COVID-19 in staff or residents in the last 7 days has remained similar to the previous fortnight, following a period of steady decrease. The most recent data shows 35 care homes with one or more confirmed cases, compared to 34 in the previous week. This figure for the last 20 days has decreased to 78, down from 92 in the period ending 7 September 2022. In Wales there are 1,029 adult care homes in total.



- As of 21 September 2022, the <u>number of notifications to CIW of deaths of adult care home residents involving COVID-19</u> (both confirmed and suspected) in the last 7 days has increased slightly to 3, compared to 1 in the previous week.
- In total, CIW has been notified of 2,230 care home resident deaths with suspected or confirmed COVID-19 between 1 March 2020 and 21 September 2022. This makes up 13% of all adult care home resident reported deaths (17,170) during this period.

Schools

- As of 5 October 2022 an average of 90.4% of half-day school sessions were recorded as present for pupils aged 5 to 15 over the week of 26 to 30 September 2022, the same as the week before. The figure for 20 to 23 September 2022 has been revised down from 90.6%. The full report is available here.
- An average of 6.6% of half-day school sessions were recorded as authorised absence for pupils aged 5 to 15 over the week of 26 to 30 September 2022, down from 6.8% the week before.
- An average of 3.0% of half-day school sessions were recorded as unauthorised absence for pupils aged 5 to 15 over the week of 26 to 30 September 2022, up from 2.8% the week before.

Weekly Influenza and Acute Respiratory Infection Report - PHW

- As at week ending 02 October, <u>PHW</u> report that confirmed influenza cases continue to be seen at low levels. Similarly, RSV confirmed cases are at low levels. During Week 39 (ending 02/10/2022) there were 58 cases of influenza (an increase from the previous week), with one further case reported late from samples in a preceding week. COVID-19 cases continue to be detected in symptomatic patients in hospitals and in the community.
- RSV incidence in children under 5 years of age is currently at levels that would indicate low levels of activity (compared to the 10 seasons leading up to 2020).
- Rhinovirus, influenza A and RSV are the most commonly detected cause of non-COVID-19 Acute Respiratory Infection (ARI). Rhinovirus detection have markedly increased during Week 39.
- The percentage of calls to NHS Direct Wales which were 'influenza-related'
 (cold/flu, cough, fever, headache and sore throat) during Week 39 increased
 to 19.8%. Confirmed RSV case incidence in children aged under 5 has
 increased, remaining above the baseline threshold, but at low intensity levels.
- Community and syndromic influenza indicators remained low in the UK. GP Influenza Like Illness (ILI) consultations increased in Scotland to 2.1 per 100,000 and decreased in Northern Ireland to 0.7 per 100,000. This is well below the baseline intensity threshold.
- As at 03 October 2022, based on data up to 18 September 2022, the WHO
 report that globally, influenza activity remained low with influenza A(H3N2)
 viruses predominately detected. In Europe, overall influenza activity remained
 at inter-seasonal levels with influenza A(H3N2) detections increasing in a few
 countries.

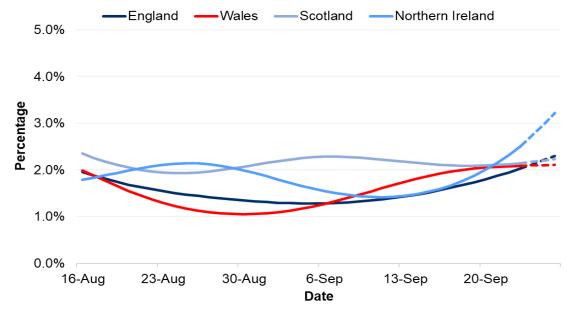
2. Situation in the UK and international comparators

UK Infection positivity – ONS Coronavirus Infection Survey, 20 to 26 September 2022

- The ONS Coronavirus Infection Survey reports that at the midpoint of the most recent week (20 to 26 September 2022), the positivity rate has increased in Northern Ireland and England.
- The trend in the percentage of people testing positive in Wales was uncertain in the most recent week, however the trend increased over two weeks.
- The trend in the percentage of people testing positive in Scotland was uncertain in the most recent week.
- In Wales, the estimated number of people testing positive for COVID-19 was 63,400 people (95% credible interval: 49,200 to 78,900), equating to 2.09% of the population, or around 1 in 50 people.
- In England, the estimated number of people testing positive for COVID-19 was 1,101,500 people (95% credible interval: 1,046,500 to 1,175,100), equating to 2.03% of the population, or around 1 in 50 people.
- In Scotland, the estimated number of people testing positive for COVID-19 was 113,000 people (95% credible interval: 92,100 to 135,700), equating to 2.15% of the population, or around 1 in 45 people.
- In Northern Ireland, the estimated number of people testing positive for COVID-19 was 46,100 people (95% credible interval: 34,700 to 59,100), equating to 2.51% of the population, or around 1 in 40 people.

*Note since these estimates are based on a relatively low number of positive tests, there is some uncertainty and the results should be interpreted with caution. In April 2022 the survey moved to an online data collection method, with postal returns for swabs and blood samples.

Positivity rates (%) across UK countries 18 to 24 September 2022

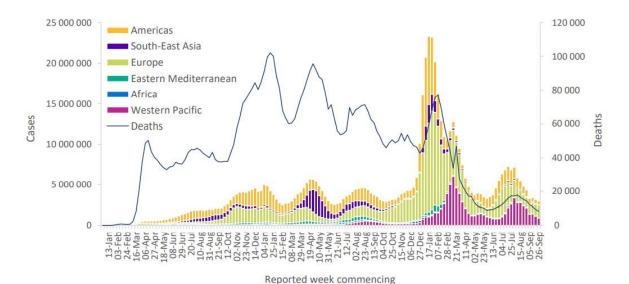


Long Covid

- An estimated 2.3 million people living in private households in the UK (3.5% of the population) were experiencing self-reported long COVID (symptoms continuing for more than four weeks after the first confirmed or suspected coronavirus (COVID-19) infection that were not explained by something else) as of 3 September 2022
- Long COVID symptoms adversely affected the day-to-day activities of 1.6 million people (72% of those with self-reported long COVID) in the UK, with 342,000 (15%) reporting that their ability to undertake their day-to-day activities had been "limited a lot".
- Fatigue continued to be the most common symptom reported as part of individuals' experience of long COVID (69% of those with self-reported long COVID), followed by difficulty concentrating (45%), shortness of breath (42%), and muscle ache (40%).
- Data for Wales showed that an estimated 120,000 people (3.9% of the population) had self-reported long COVID (symptoms beyond 4 weeks) in the four-week period ending 3 September 2022. The full report is available here.

International overview - World Health Organisation update

• The WHO reports that globally, the number of new weekly cases decreased by 6% during the week of 26 September to 2 October 2022 as compared to the previous week, with over 2.9 million new cases reported. The number of new weekly deaths decreased by 12% as compared to the previous week, with over 8300 fatalities reported. As of 2 October 2022, over 615 million confirmed cases and over 6.5 million deaths have been reported globally.



Source: WHO Weekly Epidemiological Update on COVID-19

- The highest numbers of new weekly cases were reported from Germany (400 214 new cases; +42%), the United States of America (312 125 new cases; -15%), Japan (306 958 new cases; -43%), China (303 092 new cases; +4%) and France (264 889 new cases; +15%). The highest numbers of new weekly deaths were reported from the United States of America (2728 new deaths; +6%), the Russian Federation (711 new deaths; similar to the previous week), Japan (563 new deaths; -15%), China (368 new deaths; -26%) and Brazil (286 new deaths; -36%).
- As at 07 October 2022, <u>ECDC reports</u> that the epidemiological picture suggests that there is increasing transmission in most of the reporting EU/EEA countries, which is affecting the population aged 65 years and above. This is causing an impact on hospital/ICU indicators, although the increases in hospitals should be interpreted in the context where differentiating hospitalisation with or because of COVID-19 is not possible in many countries.
- Most of the reported increases were recent, albeit several countries showed an increase in a hospital/ICU indicator for three or four consecutive weeks, and five countries showed increases in death rate.
- Changes in population mixing following the summer break are likely to be the main driver of these increases, with no indication of changes in the distribution of circulating variants. Due to the recent increase in case notifications

- observed, it is important to continue close monitoring of the epidemiological situation and the severity indicators.
- The pooled EU/EEA notification rate of COVID-19 cases among people aged 65+ years increased by 14% compared with the previous week. Increases were observed in 19 of the 26 countries reporting data on this indicator. The pooled rate has been increasing for two weeks. Increases in overall (all-age) pooled EU/EEA notification rates has been reported for three consecutive weeks, with 17 countries reporting an increasing trend.
- Pooled EU/EEA rates of hospital or ICU indicators have increased for 1-2 weeks. Of the 26 countries reporting data on these indicators, 15 observed an increasing trend in at least one indicator compared with the previous week.

3. Variant of Concern update

PHW report the weekly summary of the total number of COVID-19 variants of concern (VOC) in Wales. (Data correct as at: 4 Oct 2022).

| Variant | Lineage | Alternate names | 30 day cases* | Total cases | Change |
|--------------------------|-----------|----------------------------------|------------------|-------------|--------|
| All cases | | | 1,112 | 133,963 | +358 |
| VOC-22JAN-01 | BA.2 | BA.2 | 2 | 29,186 | +1 |
| VOC-22APR-03 | BA.4 | | 42 | 1,275 | +13 |
| VOC-22APR-04 | BA.5 | ₩0 | 559 | 4,981 | +163 |
| V-22JUL-01 | BA.2.75 | - | 8 | 12 | +3 |
| Not elsewhere classified | B.1.1.529 | B1.1.1529, BA.3, genotyped cases | 501 | 41,343 | +178 |

Source: Public Health Wales COVID-19 genomic surveillance

- The <u>WHO reports</u> that globally, from 3 September to 3 October 2022, 104,128 SARS-CoV-2 sequences were shared through GISAID. Among these, 104,055 sequences were of the Omicron variant of concern (VOC), accounting for 99.9% of sequences reported in the past 30 days.
- There continues to be increased diversity within Omicron and its descendent lineages. A number of these Omicron descendent lineages are under monitoring.
- During epidemiological week 36 (5 to 11 September 2022), as samples from more recent weeks may have not been reposited, BA.5 descendent lineages continued to be dominant accounting for 80.8% of sequences, followed by BA.4 descendent lineages (including BA.4.6) which accounted for 7.8%, and BA.2 descendent lineages (including BA.2.75) which accounted for 3.1% of sequences.
- During the same week (5 to 11 September), unassigned sequences (presumed to be Omicron) accounted for 8.3% of sequences submitted to GISAID.
- These variants are being monitored and assessed by WHO based on criteria
 of genetic constellations of mutations, and/or indications of a rise in
 prevalence in a geographic location, as well as any evidence of phenotypic
 changes. All of these lineages have different additional mutations, yet the
 majority do not warrant concern, either based on current knowledge of
 relevant genetic sites, or based on very low sequence circulation over several
 weeks.