

## **NI COVID 19 Modelling Group Conference Call – 1 December 2020**

### **Attendees**

Ian Young DoH (Chairperson)

NR

Stephen Bergin PHA

Declan Bradley PHA

Paul Montgomery DoH

### **Key issues discussed**

#### ***Update***

- An update was provided on the latest position in respect of the key indicators of the trajectory of the virus and the impact on the health & social care (HSC) sector. The number positive of cases had continued to decline over the past week following a brief stall in the middle of November. A more consistent downward trend was observed in the percentage of people testing positive in the Covid-19 Infection Survey. Paul McWilliams indicated that the number of cases had started to trough in recent days.
- Although most Local Government Districts experienced a reduction in cases over the past week, a majority have seen an increase in recent days. Overall, NI has fewer cases per head of population than England and Wales, but more than in Scotland and significantly more than in the Republic of Ireland. Ian highlighted that the more severe but shorter firebreak approach adopted in Wales appeared to have had less of an impact than the less strict but more prolonged approach in NI.
- There continues to be a decline in the number of hospital admissions although the number of in-patients remains higher than the Wave 1 peak. NR suggested that the number of Covid positive inpatients was unlikely to fall below 250 by the time the current restrictions were due to end. Mobility data suggested that there had been a significant increase in activity in advance of the current restrictions coming into force.
- The group agreed that the latest estimate of the R number is between 0.9-1.1 for cases (0.7-0.9 last week) and 0.7-0.9 for hospital admissions (0.9-1.0 last week). This was in line with the estimated range for case numbers provided by Magda Bucholc (0.91-0.99). Paul McWilliams agreed to provide an update of the daily estimates of the R number for ICU to inform the weekly figure.
- Ian advised the group that it was unclear what approach would be adopted when the current restrictions ended on 11 December. In the context of the expected level of Covid positive inpatients at the end of the current restriction period and

that an R value of 1.8 implies a doubling time of 1 week, there remains the risk that hospitals would come under severe pressure in the period after Christmas when staff availability would normally be lower. Ian has asked Paul to model a number of different scenarios while recognising that it is not possible to make predictions or forecasts given the uncertainties in respect of the policy approach.

- Declan referred to analysis discussed at SPI-M which suggested that the greater tendency for intergenerational mixing at Christmas, particularly between the very young and very old, implies that there would be a larger impact on hospital demand than the level of contacts would imply.
- Stephen Bergin queried whether the experience of the summer period would suggest that there is a longer lag period between waves of infection. Ian indicated that the environmental context was different in the winter period with more people indoors and lower levels of sunlight. There was growth in the number of Covid-19 cases during the summer period, but this was from a lower base level and therefore less obvious. This in turn reflected the more rigorous nature of the restrictions during the initial lockdown with concern raised that the allowance of click and collect services under current restrictions had resulted in crowding in shopping centres.
- **NR** queried the timing of the vaccination programme and whether this would have an impact on case numbers. Ian informed the group that the vaccination programme was planned to begin before Christmas with a common approach adopted across the UK. However, the 5 week lag between vaccination and maximum immunity meant that there would be expected to be limited impact on transmission in the community, but some effect on nosocomial infection. Overall, the expectation was that at least one further lockdown would be required before vaccination levels were sufficiently high.

#### **AOB**

- **NR** has provided a report on the results of the six waves of the contact survey to date. Ian highlighted that the value of the contact survey is based on whether it provides a reliable signal for the value of R and whether it provides learning in respect of the impact of restrictions. He asked whether it would be possible for a presentation to be made to the group on the survey results and the findings in respect of these two aspects.
- **NR** highlighted an issue with the contact survey for children in respect of the identification of the age of the child for whom a parent provided the response on the number of contacts.
- **NR** also provided an update in respect of the JBC Analysts group with a remaining issue in respect of the NI data published on the UK Government website being different from that on the Department of Health website. Ian will raise issue with IAD.