In the past week, a total of 83 consultations for influenza-like illness were reported from 88 general practices in all 24 health districts. This gives a weekly consultation rate of 21.5 per 100,000 patient population.

The graph below compares the consultation rates for influenza-like illness for each health district over the past week. Eastern Bay of Plenty had the highest consultation rate (203.5 per 100,000, 4 cases), followed by Tauranga (67.4 per 100,000, 1 case) and Rotorua (60.2 per 100,000, 1 case).

Thirty-three swabs were sent from the sentinel surveillance in the past week. Forty swabs were received by the virology laboratories. Of these, four influenza viruses were identified, three as seasonal influenza AH1N1 by PCR from Waikato (1), Eastern Bay of Plenty (1) and Manawatu (1), and one as A/Brisbane/59/2007 (H1N1) - like virus from Waikato.

In addition, 11 influenza viruses were reported this week from the laboratory-based (non-sentinel) surveillance: seasonal AH1N1 by PCR (5), seasonal influenza AH3N2 by PCR (4) and influenza A (yet to be sub-typed) (2). The distribution by health district is shown in Table 1.

<table>
<thead>
<tr>
<th>Antigenic Strain</th>
<th>CA</th>
<th>SA</th>
<th>WK</th>
<th>CB</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>A (yet to be sub-typed)</td>
<td>1</td>
<td>0</td>
<td>0</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Seasonal influenza AH1N1 virus by PCR</td>
<td>0</td>
<td>0</td>
<td>4</td>
<td>1</td>
<td>5</td>
</tr>
<tr>
<td>Seasonal influenza AH3N2 virus by PCR</td>
<td>3</td>
<td>1</td>
<td>0</td>
<td>0</td>
<td>4</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>4</td>
<td>1</td>
<td>4</td>
<td>2</td>
<td>11</td>
</tr>
</tbody>
</table>
Figure 2 shows the cumulative total of influenza viruses confirmed (sentinel and laboratory-based surveillance) to the end of week 22, 31 May 2009. A total of 72 influenza viruses were identified: A (yet to be sub-typed) (17), seasonal AH1N1 by PCR (21), seasonal AH3N2 by PCR (17), novel influenza AH1N1 swine-lineage virus (12), A/Brisbane/59/2007 (H1N1) - like virus (3), and B (not antigenically typed) (2). So far, 18 seasonal AH1N1 viruses have been tested for the H275Y mutation (histidine-to-tyrosine mutation at the codon of 275 in N1 numbering) which is known to confer resistance to Oseltamivir. All 18 viruses had the H275Y mutation.

Figure 3 shows the weekly national consultation rates for 2007 and 2008 seasons, and 2009 so far. The current rate of influenza is lower than at the same time last year.
Figure 3: Weekly consultation rates for influenza-like illness in New Zealand, 2007, 2008 and 2009
Figure 4 illustrates consultation rates for influenza-like illness mapped by health district for week 22, 2009.
Non Seasonal Influenza A (H1N1) swine lineage virus Update in New Zealand

Twelve cases of non seasonal influenza A (H1N1) swine lineage viruses have been confirmed in New Zealand. A further 10 probable cases are awaiting confirmation. No deaths were reported.

For further information please refer to the Ministry of Health’s website http://www.moh.govt.nz/influenza-a-h1n1

The 2008 Influenza annual report can be found at http://www.surv.esr.cri.nz/virology/virology.php

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