

MEASLES REPORT

This report includes cases of measles notified in EpiSurv up to midnight 15 July 2011. Data were extracted from EpiSurv at 10 am, 19 July 2011.

In the last two weeks, 28 new measles cases (14 cases each week) were notified. Of these, 26 cases were confirmed and two are still under investigation. There have been 137 cases of measles reported in EpiSurv since January 2011 (compared to 37 cases reported the same time last year), including 131 confirmed cases, four probable cases and two cases are still under investigation. These were reported mainly from the Auckland region (75.2% of total cases) and Hawke’s Bay (17.5%). DHBs reporting cases include Waitemata (75 cases), Hawke’s Bay (24 cases), Auckland (15 cases), Counties Manukau (13 cases), Canterbury (7 cases), Northland, Capital and Coast, and Hutt Valley DHBs (one case each).

This report incorporates the temporal distribution of cases, since January 2011, and the distribution of cases by age, ethnicity (prioritised), and district health board (DHB), as well as a summary of confirmed cases by immunisation status. The case classification used in this report is specified in the appendix.

Temporal distribution

Weekly and historical measles notifications are shown in Figure 1 and 2, respectively. There have been 28 measles cases notified in the last two weeks and two are still under investigation. There have been weekly spikes in measles cases since the end of January 2011. However, the number of cases has increased substantially since the end of May. Based on historical trend (e.g. years 2008 and 2009) and the recent outbreaks in the Auckland Region and Hawke’s Bay DHB, we could expect more notifications during this time of the year. There have been a total of 137 notifications since 1 January 2011 (48 cases for all of 2010) including 131 confirmed cases, four probable cases and two cases still under investigation. Seventeen hospitalisations and no deaths were reported.

Figure 1 : Weekly distribution of measles notifications by week reported

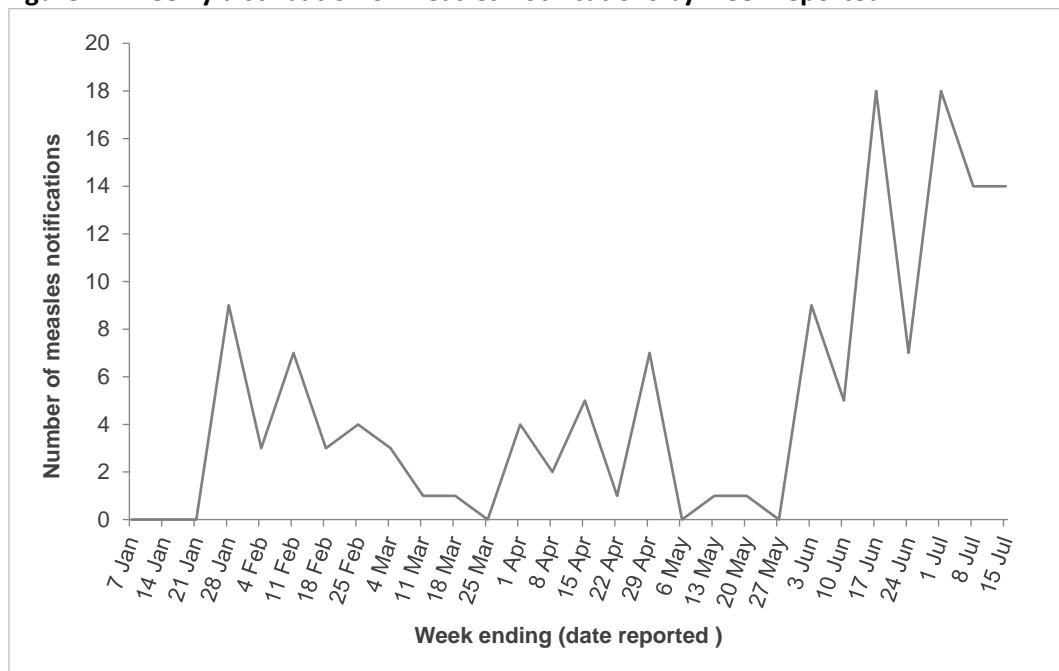
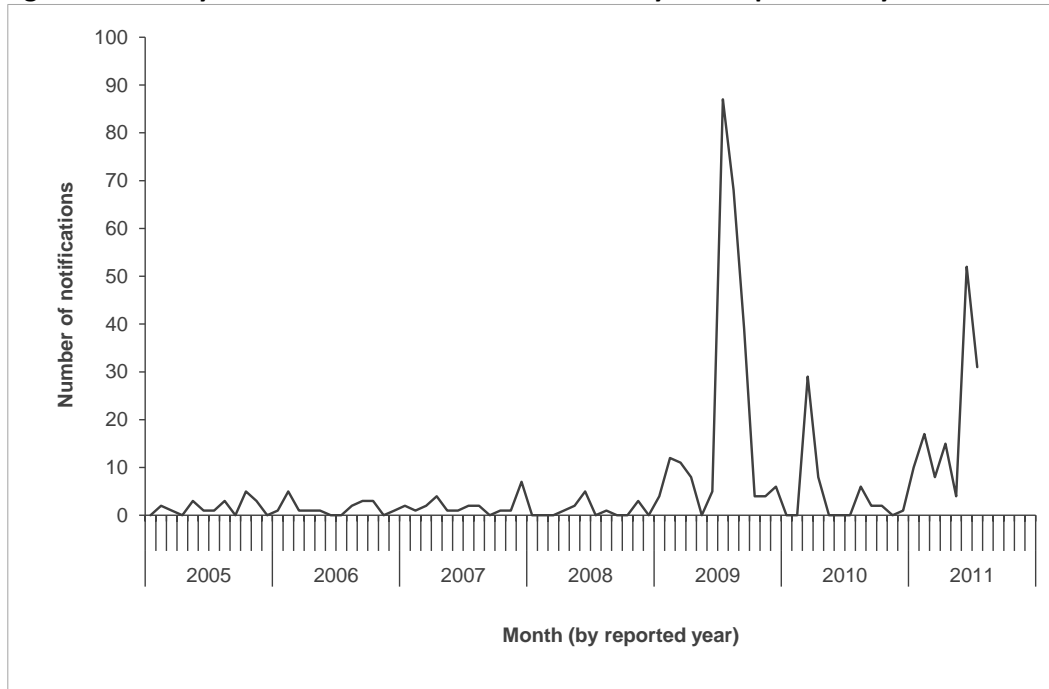


Figure 2 Monthly measles notifications since 1 January 2005 up to 15 July 2011



The onset dates were recorded for 20 measles cases notified in the last two weeks, and earliest date was 26 June 2011. Although reporting of onset dates is not always complete, 119 notifications since 1 January 2011 have onset dates available. The earliest and last onset dates since January 2011 were 6 January and 12 July, respectively.

Age and ethnicity

The age and ethnicity distributions of measles cases are shown in Table 1 and 2. Of the 131 confirmed cases with a known age reported since 1 January 2011, 72 (55.0%) were aged under 10 years, 34 (26.0%) were aged 10 to 19 years, and 25 (19.1%) were aged 20 years or older. In the past two weeks, two cases aged 10 years or older were hospitalised.

Of the 131 confirmed cases with a known age reported since 1 January 2011, 70 (53.4%) were aged 12 months to 12 years and 21 (16.0%) were aged 13 years to 20 years.

Table 1: Age distribution of measles cases and hospitalisations

Age Group	2 - 15 July 2011					Cumulative total since 1 Jan 2011				
	Total	Conf	Prob	Other	Hosp ¹	Total	Conf	Prob	Other	Hosp ¹
<15mths	4	4	0	0	0	16	13	3	0	5
15mths-3yrs	4	2	0	2	0	21	18	1	2	1
4-9 yrs	7	7	0	0	0	41	41	0	0	2
10-19 yrs	10	10	0	0	1	34	34	0	0	3
20+ yrs	3	3	0	0	1	25	25	0	0	6
Unknown	0	0	0	0	0	0	0	0	0	0
Total	28	26	0	2	2	137	131	4	2	17
<i>12mths - 12yrs</i>	<i>14</i>	<i>12</i>	<i>0</i>	<i>2</i>	<i>0</i>	<i>73</i>	<i>70</i>	<i>1</i>	<i>2</i>	<i>4</i>
<i>13yrs - 20yrs</i>	<i>7</i>	<i>7</i>	<i>0</i>	<i>0</i>	<i>1</i>	<i>21</i>	<i>21</i>	<i>0</i>	<i>0</i>	<i>2</i>

¹ Confirmed or probable measles cases where hospitalisation was recorded as "Yes".

Conf: confirmed, **Prob:** probable, **Hosp:** hospitalised

Of the 127 confirmed cases with a known ethnicity reported since 1 January 2011, 85 (66.9%) were European, 34 (26.8%) were Maori, six (4.7%) were Pacific Peoples, and two (1.6%) were "Other" ethnic groups (Table 2). Of the 25 cases reported in the last two weeks, 20 were of European ethnicity, four Maori, and one from Pacific peoples. Hospitalisations by ethnicity are also depicted in Table 2.

Table 2 : Ethnic (prioritised) distribution of measles cases and hospitalisations

Ethnicity (prioritised)	2 - 15 July 2011					Cumulative total since 1 Jan 2011				
	Total	Conf	Prob	Other	Hosp ¹	Total	Conf	Prob	Other	Hosp ¹
Maori	4	4	0	0	0	35	34	1	0	6
Pacific Peoples	1	1	0	0	0	6	6	0	0	2
Other	0	0	0	0	0	2	2	0	0	1
European	22	20	0	2	1	89	85	2	2	8
Unknown	1	1	0	0	0	5	4	1	0	0
Total	28	26	0	2	1	137	131	4	2	17

¹ Confirmed or probable measles cases where hospitalisation was recorded as "Yes".

Geographical distribution

Of the 131 confirmed cases reported since 1 January, 72 (55.0%) were reported from Waitemata, 24 (18.3%) from Hawke's Bay, 15 (11.5%) from Auckland, 13 (9.9%) from Counties Manukau, seven (3.1%) from Canterbury, and one each (0.8%) from Northland, Capital and Coast, and Hutt Valley DHBs.

The 26 cases in the last two weeks were reported from Northland, Waitemata, and Counties Manukau DHBs.

Table 3 : Geographical distribution of measles cases and hospitalisations

DHB	2 - 15 July 2011					Cumulative total since 1 Jan 2011				
	Total	Conf	Prob	Other	Hosp ¹	Total	Conf	Prob	Other	Hosp ¹
Northland	1	1	0	0	0	1	1	0	0	0
Waitemata	23	21	0	2	2	75	72	1	2	9
Auckland	3	3	0	0	0	15	15	0	0	2
Counties Manukau	1	1	0	0	0	13	13	0	0	3
Waikato	0	0	0	0	0	0	0	0	0	0
Lakes	0	0	0	0	0	0	0	0	0	0
Bay of Plenty	0	0	0	0	0	0	0	0	0	0
Tairāwhiti	0	0	0	0	0	0	0	0	0	0
Taranaki	0	0	0	0	0	0	0	0	0	0
Hawke's Bay	0	0	0	0	0	24	24	0	0	3
Whanganui	0	0	0	0	0	0	0	0	0	0
MidCentral	0	0	0	0	0	0	0	0	0	0
Hutt Valley	0	0	0	0	0	1	1	0	0	0
Capital and Coast	0	0	0	0	0	1	1	0	0	0
Wairarapa	0	0	0	0	0	0	0	0	0	0
Nelson Marlborough	0	0	0	0	0	0	0	0	0	0
West Coast	0	0	0	0	0	0	0	0	0	0
Canterbury	0	0	0	0	0	7	4	3	0	0
South Canterbury	0	0	0	0	0	0	0	0	0	0
Southern	0	0	0	0	0	0	0	0	0	0
New Zealand Total	28	26	0	2	2	137	131	4	2	17

¹ Confirmed or probable measles cases where hospitalisation was recorded as "Yes".

Immunisation status

Immunisation status of measles cases is shown in Table 4. Of the 131 confirmed cases reported since January 2011, 119 (90.8%) had a known vaccination status. Of these 119 cases, 105 were not vaccinated including 11 cases aged less than 15 months and therefore not eligible for vaccination. Thirteen cases had received one dose of vaccine but none of these had completed their second dose.

Table 4: Immunisation status of measles cases (confirmed) notified since 1 January 2011

Age Group	Total cases	One dose	Two doses	Vaccinated (no dose info)	Not vaccinated	Unknown
<15mths	13	1	0	0	11	1
15mths-3yrs	18	3	0	0	15	0
4-9 yrs	41	5	0	0	35	1
10-19 yrs	34	2	0	1	29	2
20+ yrs	25	2	0	0	15	8
Unknown	0	0	0	0	0	0
Total	131	13	0	1	105	12

Appendix

Case classification:

Confirmed	A clinically compatible illness that is epidemiologically linked to a confirmed case or is laboratory confirmed
Probable	A clinically compatible illness with all of the following symptoms: <ul style="list-style-type: none"> • a fever $\geq 38^{\circ}\text{C}$ • a generalised maculopapular rash lasting three or more days • cough, or coryza, or conjunctivitis, or Koplik spots
Other	Status recorded as <i>under investigation</i> or cases where there was insufficient information to define the status

This report will be available online from www.surv.esr.cri.nz