

# 1.4 Mumps

## Summary

Number of cases, 2013: 223  
 Number of cases, 2012: 163  
 Crude incidence rate, 2013: 4.9/100,000

There were 223 (4.9/100,000) mumps cases notified in 2013. This is higher than 2012 when 163 cases were notified and 2011 when 165 cases were notified but a decline compared to the years 2008/2009 and 2004/2005 when large outbreaks occurred (figure 1). The number of cases notified in 2013 is fivefold higher compared to the years 1998 to 2003 when there was an average of 43 cases notified each year.

In 2013, of the 223 mumps cases notified 36% (n=80) were classified as confirmed, three percent (n=6) as probable and 61% (n=137) were classified as possible.

The largest number of cases was notified in the HSE E while the highest crude incidence rate was in the HSE E and HSE SE (table 1).

In 2013, the median age of cases was 20 years and the mean age was 23 years with cases ranging in age from one to 84 years. The number of cases by age group and the age specific incidence rates are shown in figures 2 and 3. The highest age specific incidence rates were in those 0-4 years and 20-24 years. Of the 223 mumps cases, 43% (n=97) were female and 57% (n=126) were male.

Mumps vaccine in Ireland is available as part of the combined measles mumps rubella (MMR) vaccine. In Ireland, vaccination with the first dose of MMR is routinely recommended at twelve months of age and the second dose at four to five years of age. A MMR catch up campaign started in October 2012 and continued during 2013. During the MMR catch up campaign the HSE offered a dose of MMR vaccine to second level students and primary school children who had not completed (or were not sure they had) their two dose MMR vaccination schedule.

Of the 223 mumps cases, 17% (n=37) were unvaccinated, 24% (n=53) had one dose of the measles-mumps-rubella vaccine (MMR), 24% (n=54)

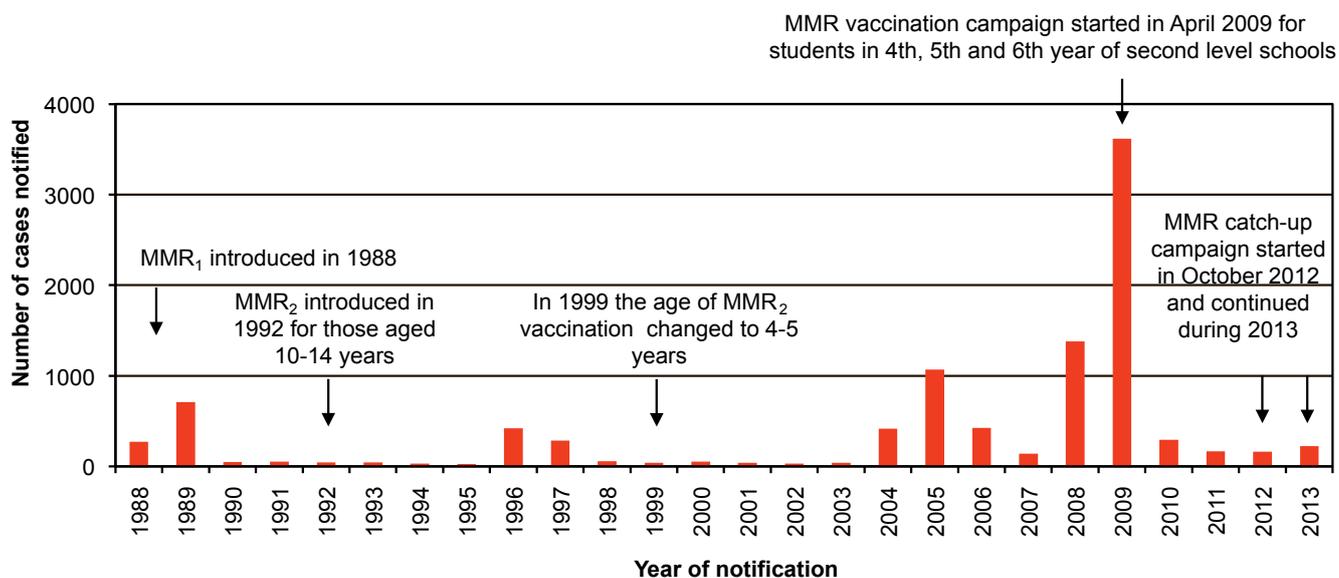


Figure 1. Number of mumps notifications by year  
 MMR<sub>1</sub>- first dose of MMR  
 MMR<sub>2</sub>- second dose of MMR  
 1988-June 2000 data collated by DoHC  
 July 2000-2013 data collated by HPSC

were reported to have received two doses of MMR, one percent (n=2) were reported to have three doses of MMR while for 35% (n=77) of cases the number of doses of MMR was not reported. The vaccination date was reported for 75% (n=40/53) of cases reported to have received one dose of MMR. Both vaccination dates were reported for 37% (n=20/54) of cases vaccinated with two doses of MMR; one of these was vaccinated one day prior to onset. The vaccination dates were available for one of the cases given three doses of MMR. Thirty-one percent (n=17/54) of the cases reported to have received two doses of MMR were classified as confirmed; 35% (n=6/17) of these cases had both MMR vaccination dates reported. Both cases reported to have received three MMR doses were classified as possible cases.

Ten cases were hospitalised, representing four percent (n=10/223) of all cases and six percent (n=10/168) of cases where hospitalisation data were provided. The number of days hospitalised was reported for six of the hospitalised cases; the median number of days hospitalised was three days (range one to 12 days).

Reported complications of mumps included orchitis (8%, n=6/75), mastitis (1%, n=1/130), pancreatitis (1%, n=1/132), deafness (1%, n=1/134), aggravated adenoids (n=1), back pain (n=1), dehydration (n=1) and painful ear (n=1).

The setting where the case most likely acquired mumps was reported for 27% (n=61/223) of cases. The identified settings for these cases were: social setting for 14% (n=31/223) of cases; family/household for four percent (n=10/223); work for four percent (n=9/223); day-care/preschool for two percent (n=4/223); primary school for one percent (n=3/223); university/college for one percent (n=2/223); international travel for 0.4% (n=1/223); and secondary school for 0.4% (n=1/223) of cases.

Table 1. Number of mumps cases notified and the crude incidence rate per 100,000 population (CIR) by HSE Area in 2013

| HSE Area     | Number     | CIR        |
|--------------|------------|------------|
| HSE E        | 101        | 6.2        |
| HSE M        | 13         | 4.6        |
| HSE MW       | 17         | 4.5        |
| HSE NE       | 13         | 2.9        |
| HSE NW       | 10         | 3.9        |
| HSE SE       | 30         | 6.0        |
| HSE S        | 20         | 3.0        |
| HSE W        | 19         | 4.3        |
| <b>Total</b> | <b>223</b> | <b>4.9</b> |

The country of infection was recorded as Ireland for 112 cases, Brazil for one case, Malta for one case, Sudan for one case, United Kingdom for two cases and was unknown/not specified for 106 cases.

Five localised outbreaks of mumps were notified during 2013 with a total of 11 associated cases of illness. The outbreak locations included a school (with three ill), a university/college (with two ill), a community outbreak (with two ill) and two of the outbreaks were associated with a private house (with two ill in each outbreak).

The figures presented in this summary are based on data extracted from the Computerised Infectious Disease Reporting (CIDR) system on 4<sup>th</sup> September 2014. These figures may differ slightly from those published previously due to ongoing updating of notification data on CIDR.

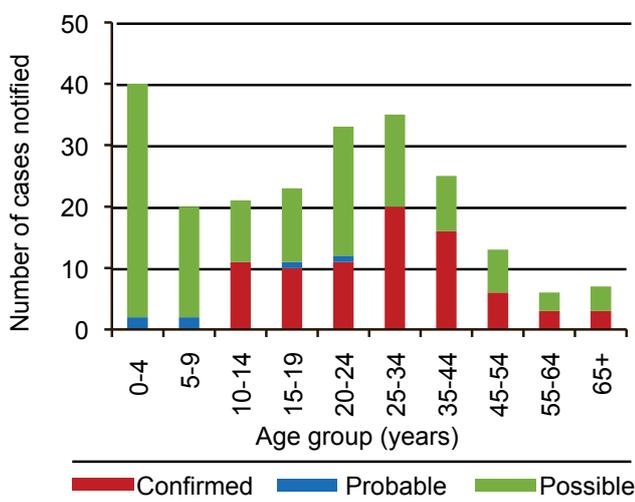


Figure 2. Number of notified mumps cases in 2013 by age group and case classification

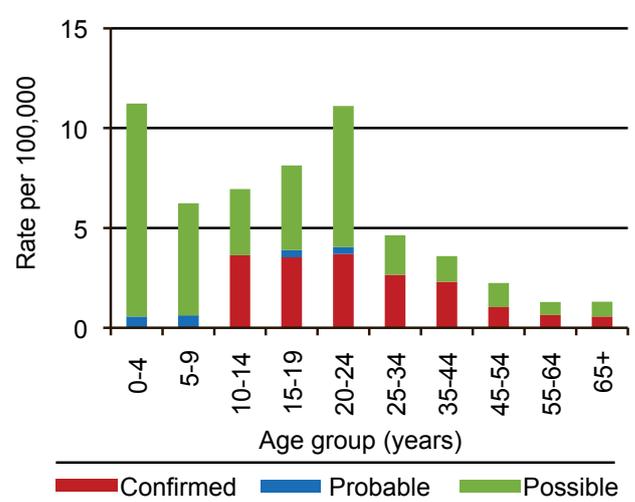


Figure 3. The age specific incidence rates (per 100,000) of notified mumps cases in 2013