



Feidhmeannacht na Seirbhíse Sláinte
Health Service Executive



Vaccine Uptake Among Junior Infants/4-5 year olds

Piaras O'Lorcain

Health Protection Surveillance Centre
(HPSC)

Vaccine Programme

- 4 in 1 (Diphtheria, Tetanus, acellular Pertussis and Polio; DTaP/IPV)) and MMR vaccines administered by HSE personnel to preschool children at Junior Infants level and by GPs in the community
- In some LHOs (Local Health Offices) these vaccines are administered by GPs and in all others by HSE personnel
- Since 2011/2012 academic year, the number of LHOs assigned to GPs and to HSE personnel has changed along with the definitions of target populations (cohorts) within them

Vaccination in LHOs by GPs and HSE personnel

- In 2013/2014, Vaccination by GPs restricted to two LHOs: Donegal, Sligo/Leitrim
- In 2012/2013, Vaccination by GPs restricted to 8 LHOs: Louth, Cavan/Monaghan, Meath, Dublin North Central, Galway (for 4 in 1 vaccine only), Mayo (for 4 in 1 vaccine only), Donegal, Sligo/Leitrim

2013/2014 Definitions for Target Populations

- **HSE Cohort Definition in LHO** (based on academic year period)
 - All children in Junior Infants on the school register in LHO on 30/Sep/2013 for the 2013/2014 academic year
- **GP Cohort Definition in LHO** (based on date of birth as GPs operate outside of school system)
 - All children born between 01/Sep/2007 and 31/Aug/2008
- Different target populations in different LHOs means that a national uptake of the 4 in 1 or MMR vaccines cannot be accurately estimated
- Note: Definitions also updated since 2012/2013

4 in 1 Vaccine Excel Template as used for 2013/2014 academic year

2013-2014 academic year			4 in 1 at 4-5 years		
HSE REGION	Local Health Office Name	Target Population Junior Infants	Number given 4 in 1	Percent immunised	Comments
DML	Dublin South			#DIV/0!	
DML	Dublin South East			#DIV/0!	
DML	Wicklow			#DIV/0!	
DML	Dublin South City			#DIV/0!	
DML	Dublin South West			#DIV/0!	
DML	Dublin West			#DIV/0!	
DML	Kildare/West Wicklow			#DIV/0!	
DML	Laois/Offaly			#DIV/0!	
DML	Longford/Westmeath			#DIV/0!	
DML	SUB-TOTAL -DML	0	0	#DIV/0!	
DNE	Dublin North Central			#DIV/0!	
DNE	North Dublin			#DIV/0!	
DNE	Dublin North West			#DIV/0!	
DNE	Louth			#DIV/0!	
DNE	Meath			#DIV/0!	
DNE	Cavan/Monaghan			#DIV/0!	
DNE	SUB-TOTAL -DNE	0	0	#DIV/0!	
SOUTH	Carlow/Kilkenny			#DIV/0!	
SOUTH	Tipperary South			#DIV/0!	
SOUTH	Waterford			#DIV/0!	
SOUTH	Wexford			#DIV/0!	
SOUTH	North Cork			#DIV/0!	
SOUTH	North Lee - Cork			#DIV/0!	
SOUTH	South Lee - Cork			#DIV/0!	
SOUTH	West Cork			#DIV/0!	
SOUTH	Kerry			#DIV/0!	
SOUTH	SUB-TOTAL -SOUTH	0	0	#DIV/0!	
WEST	Clare			#DIV/0!	
WEST	Tipperary North / East Limerick			#DIV/0!	
WEST	Limerick			#DIV/0!	
WEST	Galway			#DIV/0!	
WEST	Mayo			#DIV/0!	
WEST	Roscommon			#DIV/0!	
WEST	Sligo/Leitrim			#DIV/0!	
WEST	Donegal			#DIV/0!	
WEST	SUB-TOTAL -WEST	0	0	#DIV/0!	

 HSE LHOs
 GPs LHOs

4 in 1 Vaccine Excel Template as used for 2013/2014 academic year

2013-2014 academic year			4 in 1 at 4-5 years		
HSE REGION	Local Health Office Name	Target Population Junior Infants	Number given 4 in 1	Percent immunised	Comments
DML	Dublin South			#DIV/0!	
DML	Dublin South East			#DIV/0!	
DML	Wicklow			#DIV/0!	
DML	Dublin South City			#DIV/0!	
DML	Dublin South West			#DIV/0!	
DML	Dublin West			#DIV/0!	
DML	Kildare/West Wicklow			#DIV/0!	
DML	Laois/Offaly			#DIV/0!	
DML	Longford/Westmeath			#DIV/0!	
DML	SUB-TOTAL -DML	0	0	#DIV/0!	
DNE	Dublin North Central			#DIV/0!	

MMR Vaccine Excel Template as used for 2013/2014 academic year

2013-2014 academic year			MMR at 4-5 years		Catch up MMR			
HSE REGION	Local Health Office Name	Target population Junior Infants	Number given MMR	Percent immunised	Identified as needing a catch up MMR one month later	Number given catch up MMR	Uptake for catch-up MMR	Comments
DML	Dublin South			#DIV/0!			#DIV/0!	
DML	Dublin South East			#DIV/0!			#DIV/0!	
DML	Wicklow			#DIV/0!			#DIV/0!	
DML	Dublin South City			#DIV/0!			#DIV/0!	
DML	Dublin South West			#DIV/0!			#DIV/0!	
DML	Dublin West			#DIV/0!			#DIV/0!	
DML	Kildare/West Wicklow			#DIV/0!			#DIV/0!	
DML	Laois/Offaly			#DIV/0!			#DIV/0!	
DML	Longford/Westmeath			#DIV/0!			#DIV/0!	
DML	SUB-TOTAL -DML	0	0	#DIV/0!	0	0	#DIV/0!	
DNE	Dublin North Central			#DIV/0!			#DIV/0!	
DNE	North Dublin			#DIV/0!			#DIV/0!	
DNE	Dublin North West			#DIV/0!			#DIV/0!	
DNE	Louth			#DIV/0!			#DIV/0!	
DNE	Meath			#DIV/0!			#DIV/0!	
DNE	Cavan/Monaghan			#DIV/0!			#DIV/0!	
DNE	SUB-TOTAL -DNE	0	0	#DIV/0!	0	0	#DIV/0!	
SOUTH	Carlow/Kilkenny			#DIV/0!			#DIV/0!	
SOUTH	Tipperary South			#DIV/0!			#DIV/0!	
SOUTH	Waterford			#DIV/0!			#DIV/0!	
SOUTH	Wexford			#DIV/0!			#DIV/0!	
SOUTH	North Cork			#DIV/0!			#DIV/0!	
SOUTH	North Lee - Cork			#DIV/0!			#DIV/0!	
SOUTH	South Lee - Cork			#DIV/0!			#DIV/0!	
SOUTH	West Cork			#DIV/0!			#DIV/0!	
SOUTH	Kerry			#DIV/0!			#DIV/0!	
SOUTH	SUB-TOTAL -SOUTH	0	0	#DIV/0!	0	0	#DIV/0!	
WEST	Clare			#DIV/0!			#DIV/0!	
WEST	Tipperary North / East Limerick			#DIV/0!			#DIV/0!	
WEST	Limerick			#DIV/0!			#DIV/0!	
WEST	Galway			#DIV/0!			#DIV/0!	
WEST	Mayo			#DIV/0!			#DIV/0!	
WEST	Roscommon			#DIV/0!			#DIV/0!	
WEST	Sligo/Leitrim			#DIV/0!	NA	NA	#VALUE!	
WEST	Donegal			#DIV/0!	NA	NA	#VALUE!	
WEST	SUB-TOTAL -WEST	0	0	#DIV/0!	0	0	#DIV/0!	

HSE LHOS

GPs LHOS

NA = not applicable; No catch-up MMR (2nd dose) to be given by GPs in these LHOS

MMR Vaccine Excel Template as used for 2013/2014 academic year

2013-2014 academic year			MMR at 4-5 years		Catch up MMR			
HSE REGION	Local Health Office Name	Target population Junior Infants	Number given MMR	Percent immunised	Identified as needing a catch up MMR one month later	Number given catch up MMR	Uptake for catch-up MMR	Comments
DML	Dublin South			#DIV/0!			#DIV/0!	
DML	Dublin South East			#DIV/0!			#DIV/0!	
DML	Wicklow			#DIV/0!			#DIV/0!	
DML	Dublin South City			#DIV/0!			#DIV/0!	
DML	Dublin South West			#DIV/0!			#DIV/0!	
DML	Dublin West			#DIV/0!			#DIV/0!	
DML	Kildare/West Wicklow			#DIV/0!			#DIV/0!	
DML	Laois/Offaly			#DIV/0!			#DIV/0!	
DML	Longford/Westmeath			#DIV/0!			#DIV/0!	
DML	SUB-TOTAL -DML	0	0	#DIV/0!	0	0	#DIV/0!	
DNE	Dublin North Central			#DIV/0!			#DIV/0!	

Catch-up MMR data refers to the identification of unvaccinated school children who have received a second dose one month or so after their first

2013/2014 Data Collection

- Timeline of events (5-month period approx):
 - Excel templates distributed to LHOs on 27/Aug/2014
 - Data request reminder issued on 09/Oct/2014
 - Not until 23/Jan/2015 could a final set of agreed, completed figures be sent to WHO/UNICEF and HSE Planning & Information Unit for key performance indicator (KPI) reporting purposes
- Delay:
 - A labour intensive process
 - Specific difficulties encountered:
 - Identifying key personnel within each LHO with access to data
 - HSE target population definition open to interpretation

Overall Uptake Results for Junior Infants/4-5 year olds

Academic Year **2013/2014**

	4 in 1		MMR	
	Uptake%	Range	Uptake%	Range
HSE	91.5%	(77.4-97.7%)	91.3%	(80.3-97.7%)
GP	92.2%	(92.1-93.1%)	92.7%	(92.0-93.1%)

- Uptake levels a little short of 95% target
- MMR catch-up (2nd dose) figures in 2013/2014 not shown as data not available for 13 out of 32 LHOs

2013/2014 Uptake Results available on HPSC website at :

<http://www.hpsc.ie/A-Z/VaccinePreventable/Vaccination/ImmunisationUptakeStatistics/ImmunisationuptakestatisticsforJuniorInfants/>

Future: 2014/2015 Data

- Data Collection
 - Some HSE LHO data is being entered into the School Immunisation System (SIS)
 - GP data will still need to be collected directly from LHOs in North West
- SIS
 - Advantages:
 - Timeliness and ease of reporting should improve
 - Data from all HSE LHOs will be entered in a consistent format
 - Disadvantage:
 - Non-linkage with historical vaccination data for individuals with data held on alternate, local databases

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- National Immunisation Office
- Immunisation Coordinators
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- GPs and practice nurses/staff
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