

# COMMUNICABLE DISEASE REPORT

## Quarterly Report

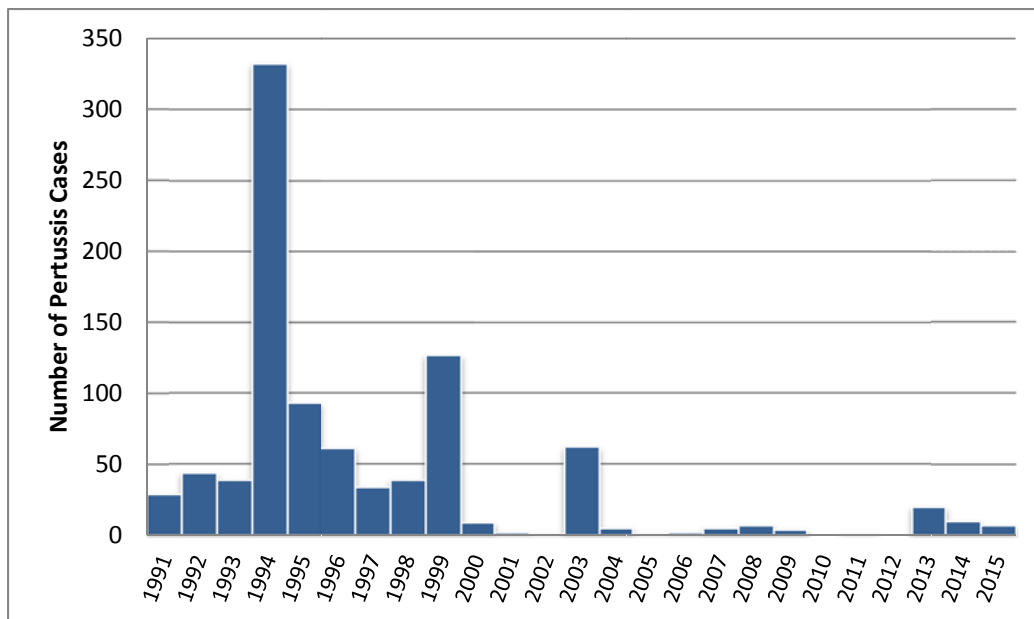
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### *Pertussis in Newfoundland and Labrador*

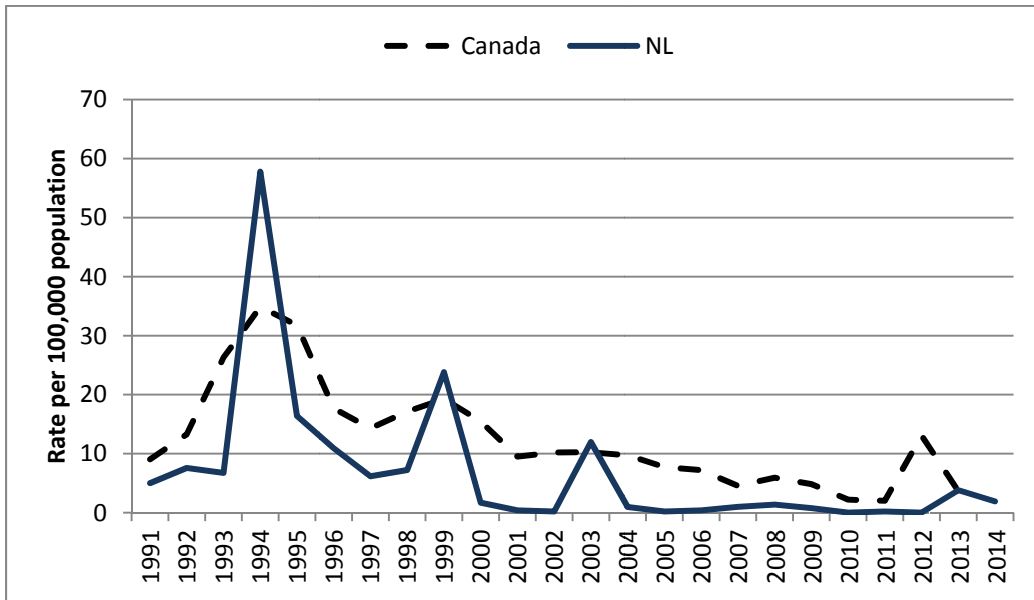
#### Cases

Since the introduction of a booster dose of immunization for students in the 9<sup>th</sup> grade in 1999, infections of pertussis have dramatically decreased (Figure 1). One exception is an outbreak of pertussis that occurred in Eastern Health (EH) in 2003. Furthermore, there were 20 cases in 2013.



**Figure 1: Number pertussis cases in Newfoundland and Labrador, 1991-2015**

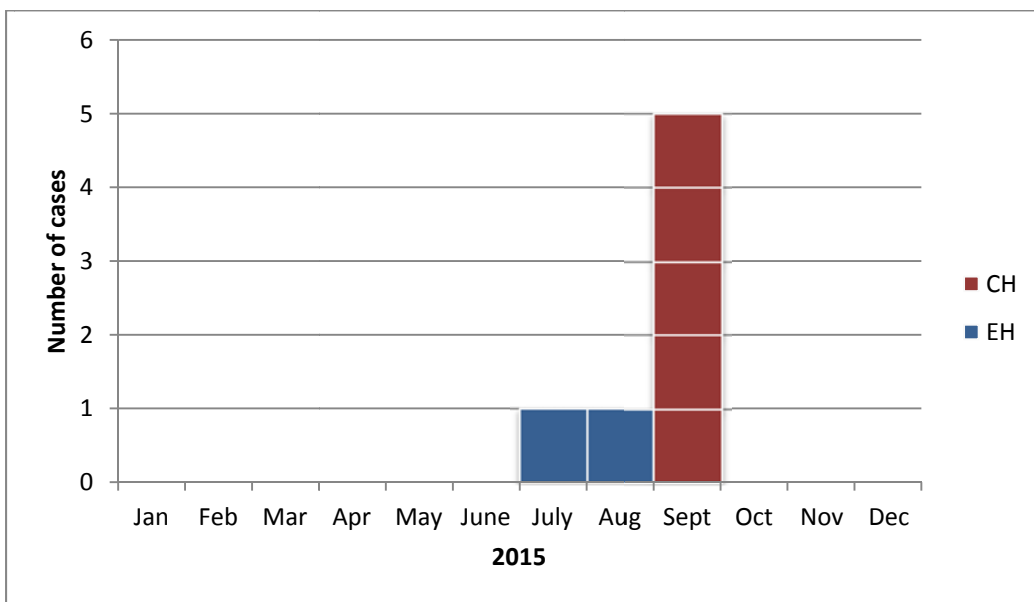
Overall, since 1991, the rate of pertussis cases has declined nationally (Figure 2). Notably, the rate for Newfoundland and Labrador was lower than the national rate for all but three years since 1991 (1994, 1999 and 2003).



**Figure 2: Rate of pertussis cases per 100, 000 population, Newfoundland and Labrador and Canada, 1991-2014**

In 2015 to date, there have been seven cases of pertussis in Newfoundland and Labrador. Five cases were 40 years of age or older; two cases were three months of age or younger. Four of the cases were female.

Five of the cases were reported in Central Health, all of these cases were linked (Figure 3). One case was laboratory-confirmed and four cases were epidemiologically linked to this case. The remaining two cases were reported in Eastern Health. There have been no epidemiologically linked cases reported to date in Eastern Health.

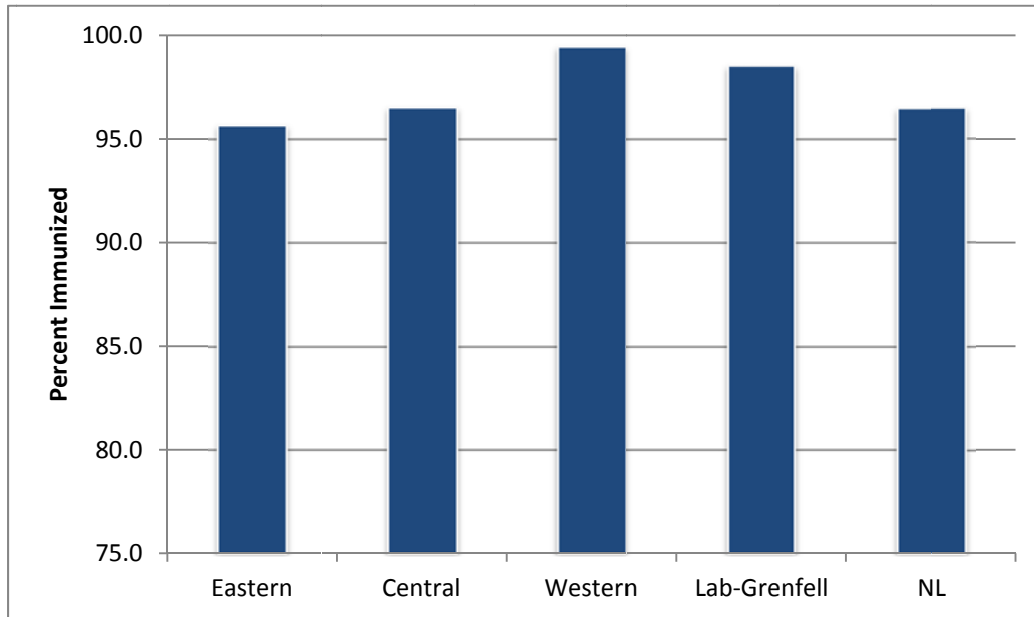


Note: Laboratory-confirmed cases are reported based on specimen collection date. Epidemiologically linked cases are reported based on date of index case.

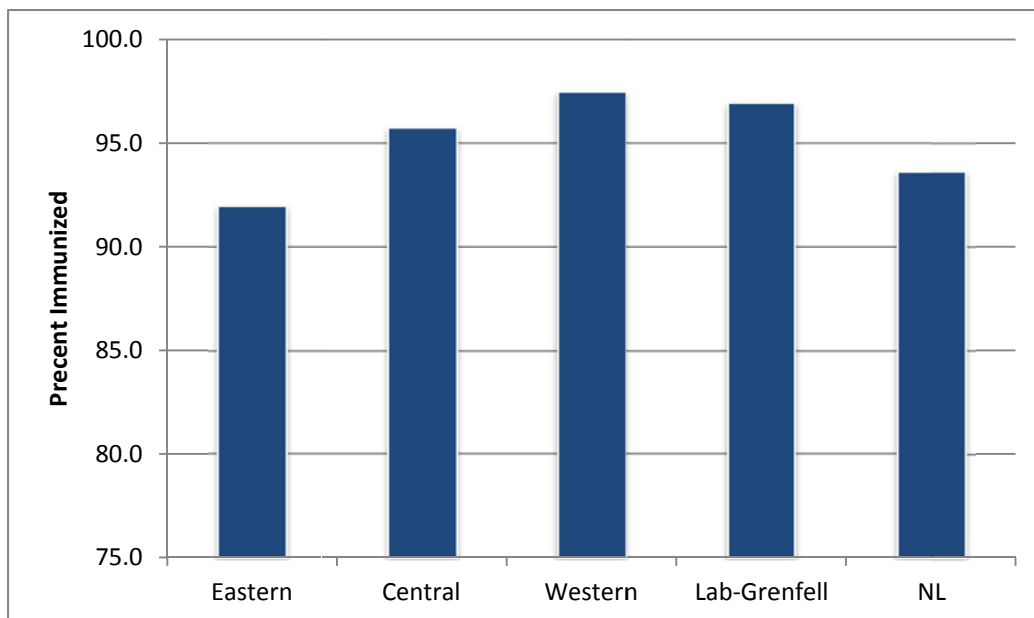
**Figure 3: Number pertussis cases by Regional Health Authority, 2015**

## Immunization

Pertussis vaccination is part of the Newfoundland and Labrador Immunization Program. Children complete a primary series with DTaP/IPV/Hib (Diphtheria, Tetanus, acellular Pertussis/Polio/*Haemophilus influenzae* type B) beginning at two months of age (Figure 4) with a booster at Kindergarten entrance (Figure 5).



**Figure 4: Immunization Coverage Rates for Primary Series (DTaP/IPV/Hib 4 dose), 2 year olds, 2014-2015**



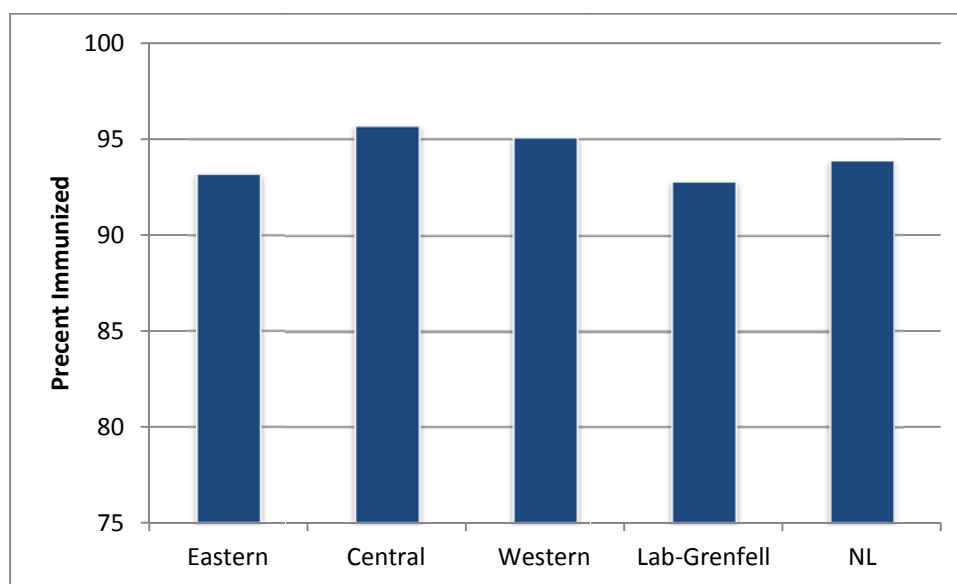
**Figure 5: Immunization Coverage Rates for Booster Dose (DaPT-IPV), Kindergarten Entrants, 2014-2015**

In adolescence and adulthood the following is recommended:

- Children in Grade 9, at age 14 – 16 years. This vaccine was changed from TdPolio (Tetanus, Diphtheria, Polio) to Tdap (Tetanus, Diphtheria, acellular Pertussis) in the fall of 1999 for people born in 1985 (Figure 6).
- Adults – one dose of Tdap if never received previously in adolescence.
- Adult dose of Tdap ten years after adolescent booster, Td to be administered every ten years thereafter.
- Health care workers
- Tdap may be used in control of outbreaks of pertussis upon advice of the MOH or designate.

For more information please visit:

[http://www.health.gov.nl.ca/health/publichealth/cdc/health\\_pro\\_info.html#immunization](http://www.health.gov.nl.ca/health/publichealth/cdc/health_pro_info.html#immunization)



**Figure 6: Immunization Coverage Rates for Booster Dose (Tdap), Grade Nine, 2014-2015**

**Newfoundland and Labrador Communicable Disease Surveillance  
Monthly Disease Report: September 2015**



DISEASE CLASS	DISEASE NAME	TOTAL			EASTERN			CENTRAL			WESTERN			LABRADOR GRENFELL		
		Sept	YTD 15	YTD 14	Sept	YTD 15	YTD 14	Sept	YTD 15	YTD 14	Sept	YTD 15	YTD 14	Sept	YTD 15	YTD 14
<b>Enteric, Food and Waterborne</b>	Amoebiasis	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Botulism	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Campylobacteriosis	6	38	32	5	28	25	0	4	3	1	5	4	0	1	0
	Cryptosporidiosis	2	7	4	0	1	0	0	0	0	2	6	3	0	0	1
	Cyclosporiasis	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Cytomegalovirus	0	29	22	0	25	11	0	2	5	0	1	4	0	1	2
	Giardiasis	2	20	17	0	0	1	0	3	3	2	16	8	0	1	5
	Hepatitis A	0	2	5	0	0	2	0	2	2	0	0	1	0	0	0
	Listeriosis	0	1	1	0	1	0	0	0	0	0	0	1	0	0	0
	Norovirus Infection	1	61	28	1	15	2	0	28	14	0	18	12	0	0	0
	Salmonellosis	5	54	72	5	23	25	0	13	23	0	13	20	0	5	4
	Shigellosis	0	0	2	0	0	1	0	0	0	0	0	0	0	0	1
	Typhoid/Paratyphoid Fever	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Verotoxigenic Escherichia coli	1	9	9	1	6	9	0	1	0	0	2	0	0	0	0	
Yersiniosis	0	0	1	0	0	0	0	0	0	0	0	1	0	0	0	
<b>Diseases Transmitted by Direct Contact and Respiratory Route</b>	Creutzfeldt-Jakob Disease (CJD)	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Group B Streptococcal Disease of Newborn	0	0	1	0	0	0	0	0	0	0	0	0	0	0	1
	Influenza Virus of a Novel Strain	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Influenza A, Laboratory Confirmed	0	400	344	0	238	130	0	66	43	0	86	56	0	10	65
	Influenza B, Laboratory Confirmed	0	73	250	0	44	70	0	11	85	0	13	89	0	5	6
	Invasive Group A Streptococcal Disease	0	12	4	0	9	2	0	0	0	0	3	2	0	0	0
	Invasive Haemophilus Influenza non-type B	0	2	2	0	1	0	0	0	1	0	0	1	0	1	0
	Invasive Meningococcal Disease (IMD), Conf	0	0	1	0	0	0	0	0	0	0	0	0	0	0	1
	Invasive Meningococcal Disease (IMD), Prob	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Invasive Pneumococcal Disease (IPD)	1	8	5	0	2	2	0	0	1	1	5	2	0	1	0
	Legionellosis	0	0	1	0	0	0	0	0	1	0	0	0	0	0	0
	Meningitis, Bacterial (other than Hib, IMD or IPD)	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Meningitis, Viral	0	3	2	0	2	2	0	1	0	0	0	0	0	0	0
	Nontuberculosis Mycobacterial Disease	1	14	5	1	13	2	0	1	1	0	0	2	0	0	0
Severe Respiratory Illness, unknown origin	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	
Tuberculosis, non-respiratory	0	2	2	0	0	1	0	0	0	0	0	0	0	2	1	
Tuberculosis, respiratory	1	26	3	1	3	0	0	0	0	0	0	1	0	23	2	
<b>Sexually Transmitted and Bloodborne Pathogens</b>	Chlamydia	78	710	624	55	469	336	7	57	53	8	86	59	8	98	126
	Gonorrhoea	2	34	51	1	26	46	1	4	2	0	1	2	0	3	1
	Hepatitis C	15	115	93	13	80	68	0	14	8	2	17	16	0	4	1
	HIV Infection	0	9	7	0	9	7	0	0	0	0	0	0	0	0	0
	Syphilis, infectious	0	28	20	0	26	19	0	1	0	0	1	1	0	0	0
	Syphilis, non-infectious	0	7	3	0	4	2	0	0	0	0	3	1	0	0	0
<b>Vectorborne &amp; Other Zoonotic Diseases</b>	Lyme disease	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Malaria	0	5	3	0	5	2	0	0	1	0	0	0	0	0	0
	Q Fever	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Rabies	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Toxoplasmosis	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Trichinellosis	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	West Nile Virus Infection	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
<b>Vaccine Preventable</b>	Chickenpox	6	141	97	5	99	57	1	14	27	0	19	6	0	9	7
	Congenital Rubella Syndrome	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Hepatitis B	0	14	10	0	10	5	0	0	2	0	2	0	0	2	3
	Invasive Haemophilus Influenza type B (Hib)	0	0	2	0	0	2	0	0	0	0	0	0	0	0	0
	Measles	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Mumps	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	Pertussis	5	7	9	0	2	9	5	5	0	0	0	0	0	0	0
	Rubella	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Tetanus	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	

Source: Communicable Disease Control System, Department of Health and Community Services, Government of Newfoundland and Labrador  
 Disclaimer: Data are subject to continuous updates; small variations in numbers may occur.  
 Note: Prior to January 2011, "Invasive Meningococcal Disease, Probable" was included under the heading "Invasive Meningococcal Disease"  
 The majority of chickenpox cases meet the probable case definition

Date verified: 3-Dec-2015