National Communicable Diseases Surveillance Report

Fortnight 03, 2020 Summary Notes for Selected Diseases

01 February to 14 February 2020

Infectious and congenital syphilis

Increases in infectious syphilis notifications are attributed to an on-going outbreak occurring in young Aboriginal and Torres Strait Islander people residing in northern and central Australia, continued increases among men who have sex with men (MSM) in urban areas of Victoria (Vic) and New South Wales (NSW), and increases in non-Indigenous women residing in urban areas of Vic, NSW, Queensland (Qld) and Western Australia (WA).

Outbreak in remote Australia

In January 2011, an increase of infectious syphilis notifications among young (15-29 years) Aboriginal and Torres Strait Islander people was identified in the North West region of Qld, following a steady decline at a national level in remote communities. Subsequent increases in infectious syphilis notifications were reported in the Northern Territory (NT) in 2013, WA in 2014 and South Australia (SA) in 2016, following sustained periods of low notification rates. The outbreak is of significant public health concern given the: elevated rates of infectious syphilis among women of child-bearing age, increasing the risk of congenital syphilis; and the concomitant risk of HIV transmission. For the latest information on the infectious syphilis outbreak, refer to the Department's website.

Increases among MSM

Since 2010, increases in notifications of infectious syphilis have been reported in MSM, predominately 20-39 years of age, residing in urban areas of Vic and NSW.

Increases among non-Indigenous women

Since 2016, increases in notifications of infectious syphilis have been reported in non-Indigenous women aged predominately 20-39 years of age residing in urban areas of NSW, Vic, Qld and WA. As noted in the outbreak in remote Australia, increases in women of child-bearing age is of significant public health concern given the increased risk of congenital syphilis.

Shigellosis

From 1 July 2018, the shigellosis surveillance case definition was changed to require notification of both confirmed and probable cases. This change in case definition is expected to result in an increase in notifications of shigellosis from 1 July 2018. Additionally, since 2014 there has been an increasing trend in national notifications of shigellosis. In the past quarter (17 November 2019 to 14 February 2020) there were 951 cases of shigellosis notified, which 2.0 times the quarterly rolling five year mean (n=486.6). Rates of shigellosis in Australia are higher amongst Aboriginal and Torres Strait Islander peoples compared with non-Indigenous populations. In 2018, the rate of shigellosis in Aboriginal and Torres Strait Islander peoples was 115.5 cases per 100,000 population, compared with 7.3 cases per 100,000 in non-Indigenous populations.

Influenza

In 2020 up to 14 February, there have been 9,158 laboratory-confirmed influenza cases reported to the National Notifiable Diseases Surveillance System (NNDSS). This is higher than the mean number of cases reported in the same period over the previous 5 years (n=4,645). However, the number of cases reported to the NNDSS in 2020 year to date remains lower than the number reported in the same period in 2019 (n=10,261).

The Department of Health closely monitors national influenza activity throughout the year, including during the inter-seasonal period. The Australian Influenza Surveillance Reports for 2019 are available on the Department's website.

Interpretative Notes

Selected diseases are chosen each fortnight based on either exceeding two standard deviations from the 90 day and/or 365 day five year rolling mean or other disease issues of significance identified during the reporting period. All diseases reported are analysed by notification receive date. Data are extracted each Monday of a CDNA week.

Totals comprise data from all States and Territories. Cumulative figures are subject to retrospective revision so there may be discrepancies between the number of new notifications and the increment in the cumulative figure from the previous period.

¹The past quarter (90 day) surveillance period includes the date range (17/11/2019 to 14/02/2020).

²The quarterly (90 day) five year rolling mean is the average of 5 intervals of 90 days up to 14/02/2020. The ratio is the notification activity in the past quarter (90 days) compared with the five year rolling mean for the same period.

³The past year (365 day) surveillance period includes the date range (05/02/2019 to14/02/2020).

⁴The yearly (365 day) five year rolling mean is the average of 5 intervals of 365 days up to 14/02/2020. The ratio is the notification activity in the past year (365 days) compared with the five year rolling mean for the same period.

The five year rolling mean and the ratio of notifications compared with the five year rolling mean should be interpreted with caution. Changes in surveillance practice, diagnostic techniques and reporting may contribute to increases or decreases in the total notifications received over a five year period. Ratios are to be taken as a crude measure of current disease activity and may reflect changes in reporting rather than changes in disease activity.

	T FN03/2020										Notification received dat											
AU	1-FNU3/2020		L ,		Sta	te or	Territo	ry				Totals for Australia			Hist	torical 90	Day Period		Hist		rical Yearly Period	
Pi		code	E	3	L	70	1	S		⋖	This reporting period	Previous reporting	Same reporting period last	Current year YTD	Past Quarter	Quarterly rolling	Ratio past	Exceeds quarterly	Past Year	Yearly rolling 5 year	Ratio past	Exceeds yearly
Disease group	Disease name	Disease	AC	NS	Z	ਰ	/S	Та		>	01/02/2020	Period 18/01/2020	year 01/02/2019	01/01/2019	17/11/2019	5 year mean	quarter/5 year mean*	rolling mean +2 SD by	15/02/2019	mean 15/02/2014	year/5 year mean*	rolling mean +2 SD by
	Hepatitis B (newly acquired)	039	-	-		2	-	-	-	-	14/02/2020	31/01/2020	14/02/2019	14/02/2020	14/02/2020	38.2	0.7	-	14/02/2020 145	14/02/2019 158.4	0.9	-
Bloodborne diseases	Hepatitis B (unspecified)	052	3	68	-	44	2	2	71	20	210	178	238	615	1,217	1,353.4	0.9	-	5,637	6,141.8	0.9	-
	Hepatitis C (newly acquired) Hepatitis C (unspecified)	040 053	- 4	- 128	- 5	29 75	- 8	- 5	- 66	- 35	29 326	29 301	31 352	85 948	212 1,868	167.8 2,324.4	1.3 0.8	22.3	797 8,340	705.0 10,034.8	1.1 0.8	-
	Hepatitis D	050	-	-	-	1	-	-	-	-	1	3			15	17.0	0.9	-	69	66.8	1.0	-
Gastrointestinal diseases	Botulism	045	-	-	-	-	-	-	-	-	-	-	-	-	-	0.8	-	-	1	1.4	0.7	-
	Campylobacteriosis Cryptosporidiosis	005 061	23	418 69	13	434 67	137 7	30 -	22 45	146 69	1,223 262	1,448 183	1,604 191	4,697 630	9,615 1,013	7,786.4 1,065.4	1.2 1.0	-	35,776 2,850	26,024.6 3,944.2	1.4 0.7	-
	Haemolytic uraemic syndrome (HUS)	055	-	-	-	-	-	-	-	-	-	1		2	4	4.6	0.9	-	17	16.2	1.0	-
	Hepatitis A Hepatitis E	038 051	-	1	-	- 4	- 1	-	- 3	1	9	9	20		70 8	68.6 12.8	1.0 0.6	-	231 49	244.8 46.6	0.9 1.1	-
	Listeriosis	018	-	-	-	2	-	-	-	-	2	-	1	7	11	21.4	0.5	-	48	76.8	0.6	-
	Paratyphoid STEC	080 054	1	- 7	- 1	<u>-</u> 1	1 25	-	2 5	- 8	5 46	5 31			24 223	26.0 110.4	0.9 2.0	-	110 686	76.2 340.8	1.4 2.0	12.0
	Salmonellosis	030	17	269	27	625	45	19	178	122	1,302	785	822		4,962	4,841.2	1.0	-	15,355	16,389.6	0.9	-
	Shigellosis Typhoid Favor	031	1	62 9	21	40	17	-	44	23	208	184	161	590 26	951 40	486.6	2.0	11.2	3,252	1,613.4	2.0	262.4
	Typhoid Fever Avian influenza in humans (AIH)	035 076	-	- 9	-	- 1	-	-	-	- 1	- 13	- 7	20	26	- 40	40.4	1.0	-	185	134.4	1.4	-
Quarantinable diseases	COVID-19	081	-	-	-	3	-	-	-	-	3	12	1	15	15	-		15.0	15	-		15.0
	Cholera MERS-CoV	008 079	-	-	-	-	-	-	-	-	-	-	-	-	-	0.4	-	-	2	1.4	1.4	-
	Plague	025	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-		-
	Rabies Severe acute respiratory syndrome (SARS)	028 071	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-		-
	Smallpox	069	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-		-
	Viral haemorrhagic fever (NEC)	036	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-		-
Sexually transmissible infections	Yellow fever Chlamydial infection	041	64	1,275	- 75	996	270	- 30	-	477	3,187	3,075	4,869	9,980	19,536	23,311.6	0.8	-	98,377	95,894.4	1.0	-
	Donovanosis	010	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	0.2	-	-
	Gonococcal infection Syphilis < 2 years	011 066	14	460 33	30 12	256	66 4	15	53	148 31	992 165	1,042 162	1,507 229	3,641 565	7,440 1,200	6,251.2 926.0	1.2 1.3	-	32,952 5,648	23,994.4 3,631.4	1.4 1.6	-
	Syphilis > 2 years or unspecified duration	067	-	3	1	8	-	-	75	5	92	55			498	493.0	1.0	-	2,440	2,064.0	1.2	59.8
	Syphilis congenital Diphtheria	047	-	-	-	-	-	-	-	-	-	3 1	-	4	7	0.8 2.8	8.8 1.1	4.5	10 7	5.8 6.6	1.7 1.1	-
Vaccine preventable diseases	Haemophilus influenzae type b	012	-	-	-	-	-	-	-	-	-	-	4	4	5	4.6	1.1	-	21	18.8	1.1	-
	Influenza (laboratory confirmed)	062 021	40	1,296	40	885	305	28	59	209	2,862	3,085	3,638	9,158	15,192 61	8,595.0	1.8 2.4	- 5.7	312,364 279	115,521.0	2.7	40,794.0
	Measles Mumps	043	3	5 6	- 1	4	- 2	-	2	1	8 19	<u>6</u> 8			61	25.2 145.0	0.4	-	184	127.2 616.4	0.3	-
	Pertussis	024	7	166	2	49	16	7	82	14	343	371	493		2,909	4,730.2	0.6	-	11,575	16,024.6	0.7	-
	Pneumococcal disease (invasive) Poliovirus infection	065 026	-	- 11	- 1	- 8	- 4	-	- 11	- 4	39	- 44	28	184	405	281.0	1.4	39.2	2,168	1,773.6	1.2	-
	Rotavirus	077	4	36	4	33	35	4	NN	11	127	125	103	565	1,952	861.6	2.3	730.8	6,315	4,045.8	1.6	-
	Rubella Rubella congenital	029 046	-	-	-	-	- 1	-	-	-	1	-	-	1	- 1	2.8	0.4	-	- 22	13.6	1.6	-
	Tetanus	033	-	-	-	-	-	-	-	-	-	-	-	1	1	0.8	1.3	-	3	3.8		-
	Varicella zoster (chickenpox)	073	8	NN	2	18	13	-	1	22	64	70			714	789.4	0.9	-	4,097	3,118.4	1.3	-
	Varicella zoster (shingles) Varicella zoster (unspecified)	074 075	19 6	NN NN	13 -	101 296	79 78	7 12	-	74 73	295 465	424 256			3,170 1,559	2,397.6 3,428.8	1.3 0.5	-	14,555 11,576	8,764.6 14,088.2	1.7 0.8	-
Vectorborne diseases	Barmah Forest virus infection	048	-	3	2	15	-	-	-		20	19			72	95.8	0.8	-	270	466.8	0.6	-
	Chikungunya virus infection Dengue virus infection	078 003	-	1 6	- 3	- 2	-	-	- 3	7	5 18	7 28			28 204	29.2 401.6	1.0 0.5	-	92 1,344	95.4 1,527.2	1.0 0.9	-
	Flavivirus infection (unspecified)	001	-	-	-	-	-	-	-	-	-	1	-	1	3	9.0	0.3	-	15	34.0	0.4	-
	Japanese encephalitis virus infection Malaria	059 020	- 1	- 1	-	- 7	- 1	-	-	- 2	- 12	1 17		39	94	0.6 88.8	1.7 1.1	-	4 367	1.0 328.6		0.6
	Murray Valley encephalitis virus infection	049	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1	-	-	0.6		-
	Ross River virus infection	002	-	5	4	27	-	1	2	8	47	57	1	1	327	1,415.0	0.2	-	2,806	5,714.4	0.5	-
Zoonoses	West Nile/Kunjin virus infection Anthrax	060 058	-	-	-	-	-	-	-	-	-	-	-	-	- 1	-		1.0	- 2	1.4	1.4	-
	Australian bat lyssavirus infection	063	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-		-
	Brucellosis Leptospirosis	004 017	-	-	-	3	-	-	-	- 1	3	- 5	- 4	4 14	5 22	6.0 22.2	0.8 1.0	-	12 87	20.0 115.4	0.6 0.8	-
	Lyssavirus infection (NEC)	064	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0	-	-	-		-
	Ornithosis Q fever	023 027	-	- 4	-	- 0	-	-	-	- 2	- 14	- 14	2 35		4 139	7.6 137.0	0.5 1.0	-	18 541	22.0 532.0		-
	U tever Tularaemia	070	-	- 4	-	- 8	-	-	-	- 2	- 14	- 14	- 35	- 63	- 139	- 137.0	1.0	-	- 541	532.0	1.0	-
Other bacterial infections	Legionellosis	015	-	3	-	3	3	-	8	2	19	16			122	99.4	1.2	-	429	403.2		-
	Leprosy Meningococcal disease (invasive)	016 022	-	-	-	- 4	-	-	- 1	- 1	- 6	- 3	4		36	2.4 52.0	0.4	-	9 205	11.4 253.4	0.8	-
	Tuberculosis	034	-	18	-	6	1	4	14	5	48	49	57	143	365	336.8	1.1	-	1,504	1,368.4	1.1	-
Footnotes:			219	4,364	260	4,090	1,121	164	755	1,524	12,497	12,121	16,180	39,660	76,412				583,863			

Footnotes:

* Ratio of the 90 day prior surveillance period to the past 90 day 5 year rolling mean, or ratio of the year period prior surveillance period to the year period 5 year rolling mean.

NN = Not Notifiable, NEC = Not Elsewhere Classified

The data in this report are reliant on the provision of data from states and territories to the Australian Government Department of Health. Backlogs in notifications at the state or territory level may contribute to delays in reporting to the NNDSS. Notifications for some high volume conditions are only uploaded quarterly by some jurisdictions, which can result in apparent large variability over time. The NNDSS is a dynamic dataset, with data in this report representing data available on (17/02/2020). Data in this report are subject to retrospective revision and may vary from data reported in published NNDSS reports and reports of notification data by states and territories.