

INFECTIOUS DISEASES

JANUARY NOTIFICATIONS

As this issue reports only January 1995 notifications, the pattern of notifications is more likely to be affected by reporting delay than that for later months of the year. Public Health Units (PHUs) that received and entered notifications earlier will appear this month to have higher notification rates. For example, 31 of 99 hepatitis C (HCV) notifications (31 per cent) were from the Hunter Area. However, in 1994 the Hunter reported an average of 43 HCV notifications a month, and its notification rate for the year overall (97/100,000 population) was considerably lower than that of some other Areas.

MEASLES IN ILLAWARRA

As reported previously, South Coast District experienced a serious measles outbreak in 1994. Notifications peaked in October with a notification rate of 148/100,000 population/month. The Illawarra PHU was prepared for a large number of measles cases also, because the Shoalhaven area of the Illawarra borders on the South Coast District. However, notifications for the Illawarra peaked in December in 1994 at a relatively moderate rate of 13.5/100,000 population for the month, with 45 cases. Since November 1994, 44 per cent of Illawarra cases have been from the Shoalhaven area.

HAEMOLYTIC URAEMIC SYNDROME

A serious outbreak of haemolytic uraemic syndrome (HUS) has been reported in South Australia, with 20 cases and one death. The outbreak was alleged to have been caused by a Garibaldi brand garlic mettwurst contaminated with *Escherichia coli* 0111.

A national recall was initiated by the National Food Authority for Garibaldi products. The only place in NSW where the Garibaldi garlic mettwurst was found to be on sale was in the Far West District. The product was removed from sale with the assistance of local authorities.

Active surveillance for cases of HUS was initiated by all NSW Public Health Units following a request by the Communicable Diseases Network of Australia and New Zealand. This active surveillance has disclosed three cases of HUS in the Hunter Area. These cases have not been related to the South Australian outbreak and initial investigations suggest they are sporadic, unrelated cases. Clinical samples have not yet confirmed an *E. coli* as the responsible organism. However, the Hunter PHU is investigating food and environmental sources to determine a possible cause for the illness in these cases.

E. coli has been described as the aetiological agent of food poisoning since around 1900. The *E. coli* strains involved in foodborne illness can be placed into six groups – enteropathogenic (EPEC), enterotoxigenic (ETEC), enteroinvasive (EIEC), enteroaggregative (EaggEC), facultatively enteropathogenic (FEEC) and enterohemorrhagic (EHEC). As well as reports of foodborne transmission, there are reports of waterborne transmission and transmission from animals, particularly cattle to humans.

EHEC cause a variety of clinical conditions ranging from non-specific diarrhoea to potentially fatal disorders such as haemorrhagic colitis, HUS and TTP. The EHEC produce two toxins – Shiga-like toxin and SLT-11. EHEC are also

referred to as verocytotoxin producing *E. coli* (VTEC). Most cases of foodborne EHEC have been associated with *E. coli* 0157:H7. Young children are frequently severely affected and deaths usually occur in the under-five age group.

LEGIONNAIRES' DISEASE IN WESTERN SYDNEY

During January-February 1995 a cluster of 11 cases of Legionnaires' disease occurred in Western Sydney. The dates of onset for the cases were between January 1 and January 25, 1995. There were three deaths, giving a case fatality rate of 27 per cent. Nine of the cases were in males and two were in females. The ages of the cases ranged from 45 to 75 years, with the predominant group being males aged 60-75 years. Risk factors associated with some of the cases included cigarette smoking and chronic respiratory disease. All cases were confirmed by a positive culture for *Legionella pneumophila* serogroup 1 or a four-fold increase in titre.

Public health action undertaken by the Western Sector PHU included:

- active surveillance for cases of Legionnaires' disease (which was extended to all other Public Health Units);
- inspection and collection of water samples from possibly implicated cooling towers; and
- ensuring that towers were immediately cleaned and disinfected as appropriate.

About 50 cooling towers in Western Sydney, including the Wentworthville, Baulkham Hills, Winston Hills and Blacktown areas, were inspected by Western Sector PHU and local government Environmental Health Officers during the investigation. All towers had been inspected and cleaned within the previous three months in accordance with the public health legislation.

An Interdepartmental Legionella Advisory Committee convened by the NSW Health Department will meet in March to re-evaluate the effectiveness of current practices for the control of Legionnaires' disease.

UPTAKE OF HIB VACCINE IN THE SYDNEY REGION, AUGUST 1994

After a similar study in 1993, a telephone survey of 4,000 households in metropolitan Sydney in August 1994 estimated immunisation coverage rates for *Haemophilus influenzae* type b vaccine as follows:

TABLE 4

UPTAKE OF HIB VACCINE [% (95% CI)]

| | Age categories | |
|-------------|----------------|--------------|
| | 3-18 months | 19-59 months |
| August 1993 | 48 (40-56) | 45 (40-51) |
| August 1994 | 80 (73-86) | 76 (71-81) |

Hib vaccine was included in the immunisation schedule and made available without charge to children born after May 1, 1993. The greatly increased immunisation coverage is associated with a fall in Hib disease notifications.

The full report is available from the authors, Peter McIntyre (Department of Paediatrics, Westmead Hospital) and Tien Chey (Western Sector Public Health Unit).

HEPATITIS A IN CENTRAL WEST

From late November to January the towns of Ralston and Kandos in the Central West of NSW have been affected by an outbreak of hepatitis A. Twenty cases have been notified to the PHU. All but two were in children. The first cases were linked to problems with hygiene and toilet plumbing in a local school, while subsequent cases were probably acquired through person-to-person transmission. In addition to ensuring that the plumbing and hygiene problems at the school were resolved, PHU staff addressed public meetings, organised talks on personal hygiene at

three schools and inspections of all local food outlets. Contacts were advised of the availability of hepatitis A vaccine and immunoglobulin to prevent infection. By the end of January the outbreak appeared to be in decline.

NON-NOTIFIABLE STDs

Updated 1994 data are presented in Table 5. The table shows that the most commonly diagnosed sexually transmitted diseases were genital warts, nongonococcal urethritis and genital herpes.

TABLE 5

**SURVEILLANCE OF NON-NOTIFIABLE SEXUALLY TRANSMITTED DISEASES
JANUARY-DECEMBER 1994**
(Diagnoses from sexual health services (SHS) unless otherwise stated in footnote.)
Unlike tables of notifiable diseases, Public Health Unit Areas in this table refer to the location of the clinic, not the residence of the patient.

* First diagnosis
1. 01/01/94-30/11/94
2. 01/01/94-31/01/94
3. 01/01/94-31/10/94
4. 01/01/94-31/03/94
5. 01/01/94-31/12/94
6. 01/01/94-30/06/94
7. No SHC in Region
8. 01/01/94-30/11/94 (No data on September)
9. No data yet received for 1994

| AHS Infection | | CSA ¹ | SSA ² | ESA ³ | SWS ⁴ | WSA ⁴ + WEN | NSA ⁵ | CCA ⁵ | ILL ¹ | HUN ⁶ | NC ¹ | ND ⁵ | WN ¹ | CW ⁷ | SW ⁸ | SE ⁹ | Total |
|------------------------------|--------|------------------|------------------|------------------|------------------|------------------------|------------------|------------------|------------------|------------------|-----------------|-----------------|-----------------|-----------------|-----------------|-----------------|-------|
| <i>Chlamydia trachomatis</i> | Male | 2 | — | 90 | 2 | 6 | 4 | 1 | 7 | 8 | 2 | 6 | 7 | — | 3 | — | 138 |
| | Female | 3 | — | 63 | 5 | 7 | 2 | 5 | 5 | 14 | 3 | 20 | 30 | — | 9 | — | 166 |
| | Total | 5 | — | 153 | 7 | 13 | 6 | 6 | 12 | 22 | 5 | 26 | 37 | — | 12 | — | 304 |
| Donovanosis | Male | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — |
| | Female | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — |
| | Total | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — |
| *Genital herpes | Male | 12 | 1 | 299 | 3 | 12 | 10 | 13 | 2 | 15 | 14 | 3 | 1 | — | 5 | — | 390 |
| | Female | 10 | 3 | 186 | 5 | 9 | 12 | 14 | 15 | 15 | 12 | 14 | 8 | — | 8 | — | 311 |
| | Total | 22 | 4 | 485 | 8 | 21 | 22 | 27 | 17 | 30 | 26 | 17 | 9 | — | 13 | — | 701 |
| *Genital warts | Male | 26 | 6 | 778 | 69 | 74 | 33 | 50 | 100 | 75 | 57 | 9 | 6 | — | 15 | — | 1,298 |
| | Female | 20 | 6 | 317 | 32 | 37 | 27 | 33 | 39 | 30 | 19 | 32 | 19 | — | 14 | — | 625 |
| | Total | 46 | 12 | 1,095 | 101 | 111 | 60 | 83 | 139 | 105 | 76 | 41 | 25 | — | 29 | — | 1,923 |
| Nongonococcal urethritis | Male | 12 | 1 | 584 | 23 | 55 | 20 | 36 | 32 | 43 | 24 | 15 | 7 | — | 9 | — | 861 |
| | Female | — | — | — | — | 3 | 6 | — | — | — | — | — | 2 | — | 2 | — | 13 |
| | Total | 12 | 1 | 584 | 23 | 58 | 26 | 36 | 32 | 43 | 24 | 15 | 9 | — | 11 | — | 874 |
| Lymphogranuloma venereum | Male | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — |
| | Female | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — |
| | Total | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — | — |

Abbreviations used in this Bulletin:

CSA Central Sydney Health Area, SSA Southern Sydney Health Area, ESA Eastern Sydney Health Area, SWS South Western Sydney Health Area, WSA Western Sydney Health Area, WEN Wentworth Health Area, NSA Northern Sydney Health Area, CCA Central Coast Health Area, ILL Illawarra Health Area, HUN Hunter Health Area, NC North Coast Public Health Unit, ND Northern District Public Health Unit, WN Western New South Wales Public Health Unit, CW Central West Public Health Unit, SW South West Public Health Unit, SE South East Public Health Unit, OTH Interstate/Overseas, U/K Unknown, NOS Not Otherwise Stated.

Please note that the data contained in this Bulletin are provisional and subject to change because of late reports or changes in case classification. Data are tabulated where possible by area of residence and by the disease onset date and not simply the date of notification or receipt of such notification.

TABLE 6

SUMMARY OF NSW INFECTIOUS DISEASE NOTIFICATIONS
JANUARY 1995

| Condition | Number of cases notified | | | |
|-------------------------------|--------------------------|----------|------------|----------|
| | Period | | Cumulative | |
| | Jan 1994 | Jan 1995 | Jan 1994 | Jan 1995 |
| Adverse reaction | 4 | — | 4 | — |
| AIDS | 47 | 6 | 47 | 6 |
| Arboviral infection | 26 | 6 | 26 | 6 |
| Brucellosis | — | — | — | — |
| Cholera | — | — | — | — |
| Diphtheria | — | — | — | — |
| Foodborne illness (NOS) | 21 | 3 | 21 | 3 |
| Gastroenteritis (instit.) | 1 | 7 | 1 | 7 |
| Gonorrhoea | 37 | 6 | 37 | 6 |
| H influenzae epiglottitis | 2 | — | 2 | — |
| H influenzae B – meningitis | 1 | 1 | 1 | 1 |
| H influenzae B – septicaemia | 1 | — | 1 | — |
| H influenzae infection (NOS) | 1 | — | 1 | — |
| Hepatitis A | 51 | 28 | 51 | 28 |
| Hepatitis B | 347 | 48 | 347 | 48 |
| Hepatitis C | 618 | 99 | 618 | 99 |
| Hepatitis D | 1 | — | 1 | — |
| Hepatitis, acute viral (NOS) | 1 | — | 1 | — |
| HIV infection | 38 | 32 | 38 | 32 |
| Hydatid disease | — | — | — | — |
| Legionnaires' disease | 3 | 6 | 3 | 6 |
| Leprosy | — | — | — | — |
| Leptospirosis | 2 | — | 2 | — |
| Listeriosis | 2 | — | 2 | — |
| Malaria | 26 | 8 | 26 | 8 |
| Measles | 156 | 69 | 156 | 69 |
| Meningococcal meningitis | 5 | 1 | 5 | 1 |
| Meningococcal septicaemia | 1 | — | 1 | — |
| Meningococcal infection (NOS) | 1 | 2 | 1 | 2 |
| Mumps | 1 | — | 1 | — |
| Mycobacterial tuberculosis | 59 | 10 | 59 | 10 |
| Mycobacterial – atypical | 50 | 1 | 50 | 1 |
| Mycobacterial infection (NOS) | 1 | 1 | 1 | 1 |
| Pertussis | 193 | 26 | 193 | 26 |
| Plague | — | — | — | — |
| Poliomyelitis | — | — | — | — |
| Q fever | 27 | 4 | 27 | 4 |
| Rubella | 21 | 1 | 21 | 1 |
| Salmonella infection (NOS) | 111 | 35 | 111 | 35 |
| Syphilis | 93 | 34 | 93 | 34 |
| Tetanus | — | — | — | — |
| Typhoid and paratyphoid | 1 | — | 1 | — |
| Typhus | — | — | — | — |
| Viral haemorrhagic fevers | — | — | — | — |
| Yellow fever | — | — | — | — |

TABLE 7

INFECTIOUS DISEASE NOTIFICATIONS FOR 1994 AND 1995
BY SELECTED MONTH OF ONSET FOR NOTIFICATIONS
RECEIVED BY JANUARY 31, 1995

| Condition | Oct | Nov | Dec | Jan | Total |
|----------------------------------|-------|-------|-------|-----|-------|
| Adverse event after immunisation | — | 5 | 5 | — | 10 |
| AIDS | 47 | 29 | 18 | 6 | 100 |
| Arboviral infection | 6 | 8 | 7 | 6 | 27 |
| Foodborne illness (NOS) | 6 | 56 | 7 | 3 | 72 |
| Gastroenteritis (instit.) | 13 | 8 | 31 | 7 | 59 |
| Gonorrhoea | 30 | 25 | 29 | 6 | 90 |
| H influenzae epiglottitis | 1 | — | — | — | 1 |
| H influenzae meningitis | 1 | 2 | 1 | 1 | 5 |
| H influenzae septicaemia | — | — | 1 | — | 1 |
| H influenzae infection (NOS) | 1 | — | 2 | — | 3 |
| Hepatitis A – acute viral | 51 | 79 | 39 | 28 | 197 |
| Hepatitis B – acute viral | 9 | 5 | 3 | — | 17 |
| Hepatitis B – chronic/carrier | 33 | 45 | 29 | 12 | 119 |
| Hepatitis B – unspecified | 457 | 407 | 281 | 36 | 1,181 |
| Hepatitis C – acute viral | 7 | 5 | 1 | — | 13 |
| Hepatitis C – unspecified | 755 | 886 | 519 | 99 | 2,259 |
| Hepatitis D – unspecified | 3 | — | — | — | 3 |
| Hydatid disease | 3 | 4 | 1 | — | 8 |
| HIV infection | 35 | 36 | 25 | 32 | 128 |
| Legionnaires' disease | 3 | — | 2 | 6 | 11 |
| Leptospirosis | — | — | 1 | — | 1 |
| Listeriosis | 1 | 1 | 2 | — | 4 |
| Malaria | 10 | 8 | 14 | 8 | 40 |
| Measles | 284 | 342 | 260 | 69 | 955 |
| Meningococcal meningitis | 12 | 5 | 5 | 1 | 23 |
| Meningococcal septicaemia | 5 | 3 | 3 | — | 11 |
| Meningococcal infection (NOS) | 4 | 2 | 2 | 2 | 10 |
| Mumps | 4 | — | 1 | — | 5 |
| Mycobacterial atypical | 26 | 15 | 11 | 1 | 53 |
| Mycobacterial tuberculosis | 21 | 18 | 16 | 10 | 65 |
| Mycobacterial infection (NOS) | 18 | 15 | 10 | 1 | 44 |
| Pertussis | 126 | 95 | 66 | 26 | 313 |
| Q fever | 21 | 23 | 19 | 4 | 67 |
| Rubella | 5 | 7 | 7 | 1 | 20 |
| Salmonella (NOS) | 87 | 72 | 88 | 35 | 282 |
| Syphilis | 82 | 77 | 47 | 34 | 240 |
| Tetanus | 1 | 1 | — | — | 2 |
| Typhoid and paratyphoid | 1 | 1 | — | — | 2 |
| Total | 2,169 | 2,285 | 1,553 | 434 | 6,441 |

TABLE 8

INFECTIOUS DISEASE NOTIFICATIONS FOR 1995
BY PUBLIC HEALTH UNIT, RECEIVED BY JANUARY 31, 1995

| Condition | CSA | SSA | ESA | SWS | WSA | WEN | NSA | CCA | ILL | HUN | NC | ND | WNS | CW | SW | SE | U/K | Total |
|-------------------------------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----|----|-----|----|----|----|-----|-------|
| AIDS | - | 3 | 1 | - | - | - | - | - | - | - | 2 | - | - | - | - | - | - | 6 |
| Arboviral infection | - | - | - | - | - | - | - | 1 | - | 2 | 3 | - | - | - | - | - | - | 6 |
| Foodborne illness (NOS) | - | - | - | 2 | - | - | - | - | - | - | - | - | 1 | - | - | - | - | 3 |
| Gastroenteritis (inst.) | - | - | - | - | - | 1 | - | - | - | 6 | - | - | - | - | - | - | - | 7 |
| Gonorrhoea | - | - | 5 | - | - | - | - | - | - | 1 | - | - | - | - | - | - | - | 6 |
| H. influenzae meningitis | - | - | - | - | - | - | - | - | - | 1 | - | - | - | - | - | - | - | 1 |
| Hepatitis A - acute viral | 2 | - | 10 | 1 | - | - | 2 | 2 | - | - | 1 | - | 1 | 7 | 2 | - | - | 28 |
| Hepatitis B - chronic/carrier | - | - | 10 | - | - | - | - | - | - | - | 1 | - | 1 | - | - | - | - | 12 |
| Hepatitis B - unspecified | - | 4 | - | 6 | 8 | - | 9 | - | 2 | 5 | 1 | - | 1 | - | - | - | - | 36 |
| Hepatitis C - unspecified | - | 3 | 1 | 4 | 3 | 2 | 13 | 1 | 7 | 31 | 24 | 2 | 1 | 2 | 3 | 2 | - | 99 |
| HIV infection | 3 | - | 10 | - | - | - | - | 2 | 1 | - | - | - | - | - | - | - | 16 | 32 |
| Legionnaires' disease | - | - | - | - | 4 | - | - | - | - | 2 | - | - | - | - | - | - | - | 6 |
| Malaria | - | - | - | 1 | 2 | 1 | 1 | 2 | - | - | 1 | - | - | - | - | - | - | 8 |
| Measles | - | 2 | 2 | 2 | 8 | 9 | 1 | 4 | 16 | 10 | - | 11 | - | - | 2 | 2 | - | 69 |
| Meningococcal meningitis | - | - | - | - | - | - | - | - | - | 1 | - | - | - | - | - | - | - | 1 |
| Meningococcal infection (NOS) | - | - | 1 | 1 | - | - | - | - | - | - | - | - | - | - | - | - | - | 2 |
| Mycobacterial atypical | - | - | - | - | - | - | - | - | - | 1 | - | - | - | - | - | - | - | 1 |
| Mycobacterial tuberculosis | 1 | 5 | 2 | - | 1 | - | - | 1 | - | - | - | - | - | - | - | - | - | 10 |
| Mycobacterial infection (NOS) | - | - | - | - | - | - | 1 | - | - | - | - | - | - | - | - | - | - | 1 |
| Pertussis | - | - | - | - | - | 8 | 2 | 4 | 6 | 3 | 2 | - | - | 1 | - | - | - | 26 |
| Q fever | - | - | - | - | - | - | - | - | - | - | - | 4 | - | - | - | - | - | 4 |
| Rubella | - | - | - | - | - | - | - | - | - | 1 | - | - | - | - | - | - | - | 1 |
| Salmonella (NOS) | - | 3 | 2 | - | 4 | 2 | 1 | - | 4 | 6 | 4 | 6 | 1 | 1 | - | 1 | - | 35 |
| Salmonella typhimurium | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |
| Syphilis | - | - | 21 | - | 1 | - | - | 1 | 2 | 3 | 1 | 3 | 1 | 1 | - | - | - | 34 |
| Tetanus | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |
| Typhoid and paratyphoid | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |

TABLE 9

SELECTED INFECTIOUS DISEASE NOTIFICATIONS FOR 1995
BY PUBLIC HEALTH UNIT, RECEIVED BY JANUARY 31, 1995

| Condition | CSA | SSA | ESA | SWS | WSA | WEN | NSA | CCA | ILL | HUN | NC | ND | WNS | CW | SW | SE | U/K | Total |
|----------------------------------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----|----|-----|----|----|----|-----|-------|
| Adverse event after immunisation | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |
| H. influenzae epiglottitis | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |
| H. influenzae meningitis | - | - | - | - | - | - | - | - | - | 1 | - | - | - | - | - | - | - | 1 |
| H. influenzae septicaemia | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |
| H. influenzae infection (NOS) | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |
| Measles | - | 2 | 2 | 2 | 8 | 9 | 1 | 4 | 16 | 10 | - | 11 | - | - | 2 | 2 | - | 69 |
| Mumps | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |
| Pertussis | - | - | - | - | - | 8 | 2 | 4 | 6 | 3 | 2 | - | - | 1 | - | - | - | 26 |
| Rubella | - | - | - | - | - | - | - | - | - | 1 | - | - | - | - | - | - | - | 1 |
| Tetanus | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |

TABLE 10

FOODBORNE INFECTIOUS DISEASE NOTIFICATIONS FOR 1994
BY PUBLIC HEALTH UNIT, RECEIVED BY DECEMBER 31, 1994

| Condition | CSA | SSA | ESA | SWS | WSA | WEN | NSA | CCA | ILL | HUN | NC | ND | WNS | CW | SW | SE | U/K | Total |
|-------------------------------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----|----|-----|----|----|----|-----|-------|
| Foodborne illness (NOS) | - | - | - | 2 | - | - | - | - | - | - | - | - | 1 | - | - | - | - | 3 |
| Gastroenteritis (inst.) | - | - | - | - | - | 1 | - | - | - | 6 | - | - | - | - | - | - | - | 7 |
| Hepatitis A - acute viral | 2 | - | 10 | 1 | - | - | 2 | 2 | - | - | 1 | - | 1 | 7 | 2 | - | - | 28 |
| Listeriosis | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |
| Salmonella (NOS) | - | 3 | 2 | - | 4 | 2 | 1 | - | 4 | 6 | 4 | 6 | 1 | 1 | - | 1 | - | 35 |
| Salmonella bovis moribificans | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |
| Salmonella typhimurium | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |
| Typhoid and paratyphoid | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - | - |