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Epidemiologic Notes and Reports

Carbon Monoxide Poisoning — Weld County, Colorado, 1993

In March 1993, the Colorado Department of Public Health and Environment (CDPHE) was notified that six family members residing in a home in Weld County had suffered carbon monoxide (CO) poisoning; five of the persons died. An investigation indicated that the source of CO had been a van parked in the garage of the home; the van had been left running, and the exhaust fumes leaked into the home. This report summarizes the investigation of this incident.

On March 10, 1993, at 7:32 p.m., emergency personnel in Weld County received an inactivity alert from the heart monitor of an outpatient. On arrival at the patient's home, they found the six family members (three adults and three children) to be dead or unconscious. Four persons (a 77-year-old woman who was wearing the heart monitor, two other adults aged 29 and 30 years, and one 8-year-old child) were pronounced dead at the scene. The decedents were found on the first floor of the house, in upstairs bedrooms, and in the basement; on autopsy, carboxyhemoglobin (COHb) levels of the decedents ranged from 72% to 78%. Two other children (aged 12 and 11 years) were found unconscious in the basement. Although their initial COHb levels were similar, clinical features of the two patients were distinctly different.

Patient 1. On discovery, the 12-year-old boy was in electromechanical dissociation but was successfully resuscitated. On physical examination in the emergency department, he was flaccid with intermittent decerebrate posturing, had no spontaneous breathing, and was unresponsive to pain. The pH of an arterial blood sample was 7.01 and the COHb level, 16%. CO poisoning was diagnosed. After his metabolic status was stabilized, hyperbaric oxygen (HBO) therapy was initiated. Following the first course of treatment, the patient became hypotensive and required vasopressor therapy; cardiac evaluation revealed diminished cardiac function. On March 11, an electroencephalogram (EEG) revealed seizure activity, and a computed tomography (CT) scan of the brain showed diffuse cerebral edema with hypodense anoxic white matter. On March 15, the patient died.

Patient 2. On discovery, the 11-year-old boy was comatose. At the hospital, he had an initial COHb level of 12% and had stable cardiovascular function but remained comatose and required ventilatory support; CO poisoning was diagnosed. During the first week of hospitalization, he also received HBO therapy. Neurologic examination demonstrated decorticate posturing and mixed reflexes. EEGs revealed diffuse slowing; a

Carbon Monoxide Poisoning — Continued

CT scan showed moderate cerebral edema with white matter involvement and petechial hemorrhages of the cortex, basal ganglia, and thalami. He remained comatose but ventilatory support was not required. At the beginning of the fourth week, he began to regain consciousness and to respond to voice commands; an EEG showed improved electrical activity. He subsequently was transferred to a pediatric rehabilitation program, improved, and, during January 1994, returned to school and resumed routine daily activities.

Investigation. A police investigation suggested that a van parked in the garage of the family home had been left running after the family had returned from an outing the previous night, approximately 24 hours before discovery. The garage adjoined the family room on the first level of the tri-level home. When emergency personnel arrived at the home, they found the door between the garage and the house was closed.

Approximately 2 hours after discovery of the family, environmental sampling by the gas company detected CO levels ranging from 17 to 64 parts per million (ppm) throughout the house; a sample from inside the van measured 448 ppm CO. These measurements were taken after emergency personnel had opened the garage door and several windows in the house. The furnace and hot water heater were inspected; exhaust vents on both appliances had been installed properly, and there were no indications of high CO output.

Reported by: M Cook, MS, L Miller, MD, Injury Epidemiology; R Hoffman, MD, State Epidemiologist, Colorado Dept of Public Health and Environment; B Clem, MD, Presbyterian/St. Luke's Medical Center, Denver; Greeley Police Dept. Air Pollution and Respiratory Health Br, Div of Environmental Hazards and Health Effects, National Center for Environmental Health, CDC.

Editorial Note: Since 1985, CDPHE has conducted surveillance for fatal and nonfatal unintentional CO poisoning. Although CO poisoning is preventable, during 1986–1991, a total of 174 fatal and 779 nonfatal unintentional CO poisonings were reported in Colorado. Nationally, approximately 590 deaths occur annually from unintentional CO poisoning (*1*). Fatal CO poisoning occurring in the household setting could be prevented if occupants could become alerted to the presence of the gas before concentrations reached toxic levels. The deaths described in this report resulted from inhalation of exhaust that leaked into the home from the adjoining garage where a van had been left running.

CO is an insidious poison that is a naturally occurring byproduct of the incomplete combustion of fuels. Because CO is colorless, tasteless, odorless, and nonirritating, its presence usually is not detected. CO is a component of exhaust and smoke (including cigarette smoke), and accumulation of CO may be associated with any combustion process occurring indoors (e.g., home heating, cooking, or a running vehicle or gasoline-powered tool)—particularly when ventilation is inadequate (*2,3*).

CO induces toxic effects by tightly binding to hemoglobin to form COHb and reducing the oxygen-carrying capacity of the blood. Other potential mechanisms of toxicity include binding to cytochrome oxidase in the mitochondria, thereby interfering with cellular respiration (*4*), and inducement of cardiovascular compromise and consequent endothelial disruption (*5*). Because CO can induce toxicity by more than one pathway, COHb levels indicate exposure to CO but do not correlate consistently with symptoms or prognosis. Therefore, treatment and prognosis of CO poisoning are based on the clinical status of the patient at presentation rather than on COHb levels.

Carbon Monoxide Poisoning — Continued

Diagnosis of CO poisoning is problematic because early symptoms of CO exposure are nonspecific (e.g., headache, dizziness, weakness, nausea, visual disturbances, and confusion) (*4,6*) and may be mistaken for symptoms of acute, self-limited illnesses (e.g., upper respiratory tract infection and food poisoning). At least three factors are associated with COHb levels and symptoms: 1) the concentration of CO in the environment; 2) the duration of exposure; and 3) the interval between exposure and clinical assessment (as illustrated by the cases described in this report). In general, however, exposure to CO concentrations of 80–140 ppm for 1–2 hours can result in COHb concentrations of 3%–6% (normal concentration: <2% for nonsmokers, 5%–9% for smokers); this concentration may be associated with decreased exercise tolerance and, in persons who are at risk, may precipitate angina attacks and cardiac arrhythmias (*7*). Clinical manifestations associated with CO concentrations of 105–205 ppm and COHb levels of 10%–20% include headache, nausea, and mental impairment. Manifestations associated with COHb levels of 30%–60% include more profound central nervous system effects, coma, and death (*8*). Treatment of CO poisoning requires termination of exposure and initiation of therapy with 100% oxygen; HBO therapy has been recommended for patients with neurologic or cardiac symptoms, pregnant women, and children when higher cortical function cannot be measured (*4,9*).

As a result of unintentional CO poisoning incidents in Colorado, CDPHE and the U.S. Consumer Product Safety Commission (CPSC) held a press conference on October 1, 1993 (the beginning of the winter heating season) to emphasize the occurrence of CO poisonings in Colorado, provide strategies to prevent such injuries, and discuss and demonstrate the use of CO detectors. Because a high proportion of unintentional deaths from CO poisoning are associated with exposure in the household setting, CPSC has proposed national mandatory installation of CO detectors in all new residential construction beginning in 1995 and has recommended installation of these devices in all existing homes. Additional information about residential CO detectors that meet Underwriter's Laboratory standards (UL 2034) is available from the CPSC Product Safety Hotline, telephone (800) 638-2772 or (301) 504-0220.

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International Notes

Emerging Polio-Free Zone — Southern Africa, 1990–1994

A key component of the global strategy to eradicate poliomyelitis by the year 2000 is surveillance for all cases of acute flaccid paralysis (AFP), ensuring the detection of cases of paralytic polio. During the 1990s, most of the countries of southern Africa (Table 1) have reported high (i.e., 70%–90%) levels of vaccination coverage among children aged <1 year with three doses of oral poliovirus vaccine (OPV3). In addition, with the exception of Namibia, all of these countries have reported very low or zero incidence of polio (Table 1, Figure 1). To determine whether the low number of reported polio cases reflects the true incidence or underreporting, during 1992 and 1993 assessments of polio incidence and the quality of surveillance of suspected polio were conducted by teams consisting of national health officials, World Health Organization (WHO) staff and consultants, and representatives from Rotary International, using a standard protocol (*1*). This report summarizes the findings of assessments in Botswana, Lesotho, Malawi, South Africa, Swaziland, and Zimbabwe.

Of the six countries, only Malawi maintains surveillance for AFP as recommended by WHO (*2*). Since 1991, all health facilities in Malawi likely to provide care for cases of AFP have reported such cases as suspected polio in the routine monthly reporting system. The local health authority immediately initiates an investigation that includes collection of stool specimens for virologic analysis. In addition, a private group specializing in rehabilitation (Malawi Against Polio) conducts approximately 700 lameness clinics serving more than 10,000 patients annually; these clinics also provide active surveillance for convalescent cases of polio. Since 1992, 13 AFP cases have been reported to the Malawi Ministry of Health; no polioviruses have been isolated from these reported cases, and no cases clinically compatible with polio (i.e., met the WHO case definition for polio) have been identified.

In Botswana, Lesotho, and Zimbabwe, AFP surveillance has not yet been fully implemented, and surveillance is based on reporting of physician-diagnosed polio. Since 1990, each country has reported 0–2 cases annually. In 1992, the incidence of AFP was

TABLE 1. Vaccination coverage with three doses of oral poliovirus vaccine (OPV3) among children aged <1 year, 1990–1993, and number of reported poliomyelitis cases, 1990–1994 — southern Africa

	OPV3				Reported no. polio cases				
Country	**1990**	**1991**	**1992**	**1993**	**1990**	**1991**	**1992**	**1993**	**1994***
Botswana	82†	50	58	57	2	0	0	0	0
Lesotho	80	75	82	78	0	0	0	1	0
Malawi	85	78	84†	—	3	3	0	0	0
Mozambique	46	46	50	49	1	3	2	3	0
Namibia	59†	67	70	76	0	0	0	56	0
South Africa	76	82	79	81	5	2	0	0	0
Swaziland	89	79	86†	73	0	0	0	0	0
Zimbabwe	76	78†	81	73	0	0	0	0	0

*Provisional data based on reports received by World Health Organization, Geneva, as of October 3, 1994.
†Based on survey data rather than routine coverage reporting.

Polio-Free Zone — Continued

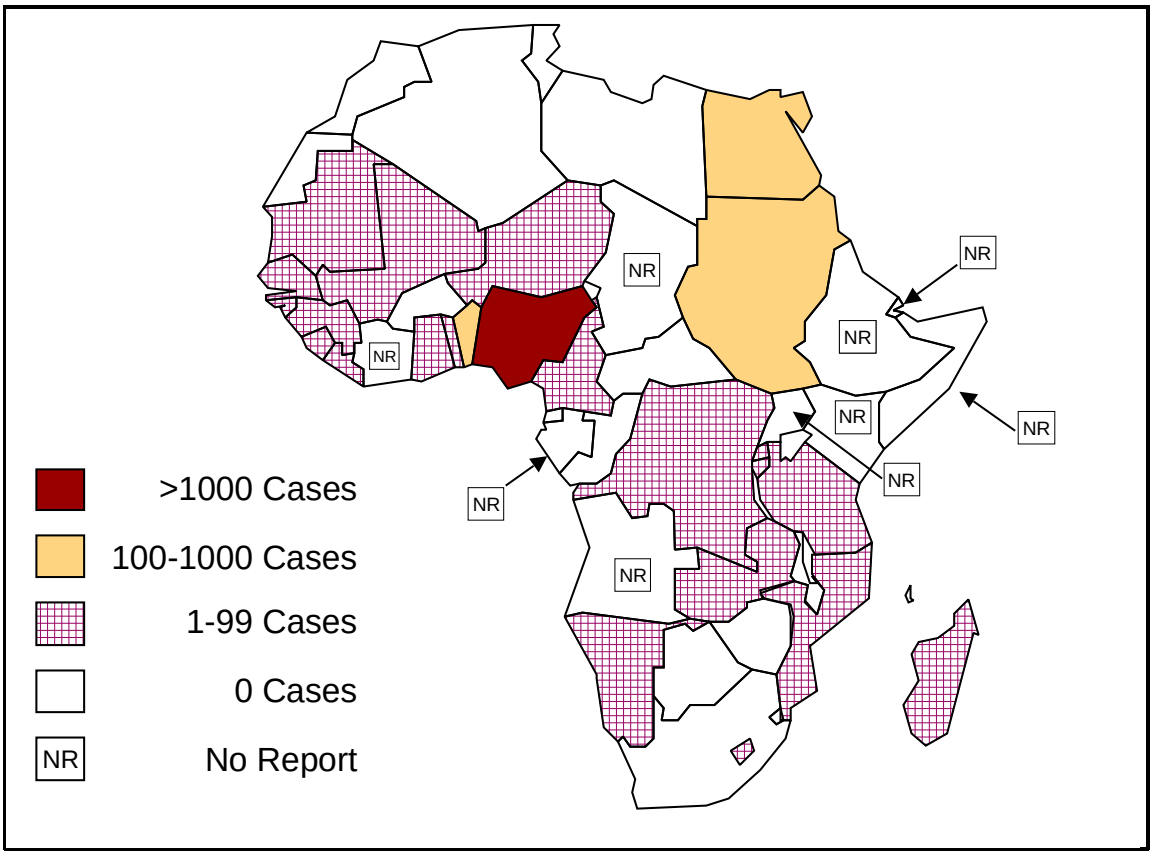
evaluated in Zimbabwe and included a review of hospital records for 1990–1992 of children aged <15 years at each of the seven provincial and three central hospitals likely to provide care to persons with cases of AFP. Of the 21 identified cases of AFP, 11 were in children aged <5 years. Three cases compatible with polio occurred during 1990–1991 but were not reported. The average annual AFP incidence was 0.17 per 100,000 children aged <15 years and 0.25 per 100,000 children aged <5 years.

In Swaziland, polio cases had been reported every year during the 1980s; however, since 1990, no cases have been reported. The national rehabilitation center registers persons with paralytic illnesses seeking rehabilitation services; none of the 22 persons registered during 1991–1992 had cases clinically compatible with polio.

In South Africa, surveillance has been based on routine reporting of physician-diagnosed polio. AFP was designated as a reportable disease in April 1994, and AFP case investigation and response in accordance with WHO guidelines is now being implemented. In September 1994, the first review of the vaccination program in South Africa conducted by national health officials and international consultants concluded that the last confirmed cases of wild virus-associated polio occurred in 1989 during an outbreak in Natal/KwaZulu (*3*).

Reported by: Ministry of Health, Botswana. Ministry of Health, Lesotho. Ministry of Health, Malawi. Ministry of Health, Mozambique. Ministry of Health, Namibia. Dept of Health, South Africa. Ministry of Health, Swaziland. Ministry of Health and Child Welfare, Zimbabwe. Expanded Program on Immunization, World Health Organization, Regional Office for Africa,

FIGURE 1. Reported cases of poliomyelitis — Africa, 1993



Source: World Health Organization.

Polio-Free Zone — Continued

Brazzaville. Rotary International, Evanston, Illinois. Div of Viral and Rickettsial Diseases, National Center for Infectious Diseases; Polio Eradication Activity, National Immunization Program, CDC.

Editorial Note: Although polio is now a rare disease in southern Africa, surveillance is neither sufficiently sensitive nor has the quality been evaluated adequately to determine whether wild poliovirus transmission has been interrupted. Therefore, efforts are needed to strengthen both the field epidemiology and laboratory components of surveillance to enable prompt detection, investigation, and notification of all AFP cases, the collection and testing of adequate stool specimens, and the application of the standard WHO polio case definition and case classification criteria. Private practitioners and traditional healers also must be encouraged to report AFP cases.

Although Namibia was considered polio-free from 1990 through May 1993, a surveillance assessment was performed in November 1993 because of the occurrence of an outbreak of 56 cases (*4*). The outbreak was attributed to the importation of wild poliovirus across Namibia's northern border with Angola, where polio remains endemic, and was terminated by a nationwide mass vaccination campaign with oral poliovirus vaccine (OPV). The outbreak in Namibia has emphasized the urgent need to establish AFP surveillance and the continuing risk for importations leading to polio outbreaks in the countries of southern Africa.

The surveillance assessment conducted in Zimbabwe in 1992 was the first systematic attempt to determine the rate of AFP in a sub-Saharan African population. The annual AFP rate in Zimbabwe was low in comparison with the reference rate of ≥1.0 per 100,000 children aged <15 years used in the Americas to define a sensitive AFP surveillance system. Explanations that may account for this finding are that 1) persons with AFP may not seek medical care or may not be referred to higher level hospitals; 2) hospital records may not be complete; 3) discharge diagnoses may be inadequately coded; or 4) the true rate of nonpolio AFP in Zimbabwe may be lower than in populations in the Americas, although during 1979–1981, the annual incidence of Guillain-Barré syndrome (the most common nonpolio cause of AFP) in the western province of South Africa ranged from 1.7 to 3.3 cases per 100,000 children aged <13 years (*5*).

The apparently low incidence or virtual absence of polio in the countries of southern Africa suggests that the reduction of poliovirus transmission has precluded the need for mass vaccination campaigns with OPV at the national level. This situation parallels that in 1987 in the southern cone countries of South America (Argentina, Chile, Paraguay, and Uruguay), which were characterized by relatively high (but geographically nonuniform) levels of OPV3 coverage and few or zero reported cases of polio. In these countries, polio-free status was achieved by 1989 through strategies of subnational mass vaccination campaigns with OPV in high-risk areas identified by low coverage or recent polio cases and aggressive AFP case ascertainment. In southern Africa, the low population density, low contact rates, and sustained high levels of routine vaccination coverage also may assist in achieving adequate herd immunity.

The International Certification Commission on Polio Eradication has established criteria by which countries can attain polio-free status (*6*). For the countries of southern Africa to achieve this objective, efforts will be necessary to strengthen polio surveillance and to implement strategies recommended by WHO for the interruption of wild poliovirus transmission (*7*). In November 1993, the African region of WHO initiated efforts to strengthen both disease surveillance and polio eradication activities (*8*).

Polio-Free Zone — Continued

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Health Objectives for the Nation

Implementation of the Medicare Influenza Vaccination Benefit — United States, 1993

Influenza is a major cause of debilitating illness and premature death in the United States, particularly among persons aged ≥65 years and those with chronic conditions such as lung or heart disease, diabetes, and cancer. Medicare reimbursement for excess hospitalizations during influenza epidemics ranges from $750 million to $1 billion (*1*). In May 1993, influenza vaccination became a covered Medicare benefit after its potential cost-effectiveness was established by the Medicare Influenza Vaccine Demonstration (*2*). During the fall of 1993, the Health Care Financing Administration (HCFA) initiated an information campaign to promote use of the influenza vaccination benefit, implemented simplified billing procedures, and improved electronic billing capabilities. However, reports during the 1993–94 influenza season suggested problems experienced by state and local health departments in implementing the new benefit. To characterize public influenza vaccination programs and problems with implementing this benefit, in the spring of 1994, CDC collected information from all 63 state and local health departments receiving federal immunization grants. This report summarizes the reports from these programs.

During April–May 1994, immunization grant programs were mailed a questionnaire asking whether they implemented influenza vaccination programs and about use of the Medicare influenza vaccine benefit. Of the 63 health departments, 45 (71%) responded; of these, 27 (60%) reported conducting influenza vaccination programs during 1993–1994 and answered questions about influenza vaccination and Medicare. All 27 reported at least one of the following problems with initial implementation of

Influenza Vaccination — Continued

the Medicare influenza vaccine benefit: 1) perceived complex billing procedures, problems with claim forms (completion and complexity), or uncertainty about how to determine eligibility (18 [67%] of 27); 2) lack of timely, accurate, and/or complete publicity and information about the benefit (17 [63%]); and 3) concerns about reimbursement for vaccine administration (e.g., varying rates within the same state and use of state funds to buy a federally reimbursed vaccine) (14 [52%]).

Respondents reported the need for two categories of improvement: 1) improved billing, claim forms, and/or eligibility procedures (24 [89%] of 27); and 2) timely and accurate publicity and information dissemination (14 [52%]).

Reported by: Selected immunization program managers and project directors. Consumer Information Team, Health Care Financing Administration. Epidemiology and Surveillance Div, National Immunization Program, CDC.

Editorial Note: One of the national health objectives for the year 2000 is to achieve 60% influenza vaccination coverage in noninstitutionalized persons at high risk for complications of influenza, including those aged ≥65 years (*3*). During 1991, only 41% of persons aged ≥65 years reported having received influenza vaccine during the previous year (*4*). Implementation of the Medicare influenza vaccination benefit is expected to improve coverage in this population by reducing the financial barrier to vaccination. Preliminary data from HCFA indicate that, during September–December 1993, claims for influenza vaccine were filed for 9.8 million Medicare beneficiaries aged ≥65 years (HCFA, unpublished data, 1994); however, this number represents only 34.6% of all Medicare beneficiaries who do not routinely receive their services from health maintenance organizations (HMOs) (data are not available on vaccination levels in Medicare beneficiaries served by HMOs). An estimated 10%–20% of Medicare beneficiaries may have received influenza vaccinations that were not billed to Medicare (HFCA and CDC, unpublished data, 1994). Vaccines were provided at public health clinics, health fairs, private medical settings, and other sites that did not bill Medicare, including hospitals not submitting separate bills for influenza vaccinations. Private providers delivered approximately 80% of all influenza vaccinations administered to persons aged ≥65 years.

During the first year of Medicare influenza vaccine coverage, some providers reported not receiving timely information about the new benefit. To improve influenza vaccination of Medicare beneficiaries and use of other covered prevention services, in May 1994, HCFA initiated the Consumer Information Strategy (CIS) (*5*). Through CIS, HCFA will develop and provide information on choice and use of health-care services to physicians, other health-care providers, consumer-based and professional societies, peer-review organizations, contractors, state health departments, other federal agencies, and to Medicare and Medicaid beneficiaries (*5*). The strategy initially focuses on major campaigns to increase beneficiary use of influenza vaccine and other preventive services.

In 1992, collaborative activities of the Medicare Influenza Vaccine Demonstration increased overall influenza vaccination rates to 59% among Medicare beneficiaries aged ≥65 years (*2*). Similar activities may be necessary to improve the vaccination rates for other vaccines intended for adults. Achieving the national health objectives for adult vaccination will require multifaceted strategies to reduce cost and accessibility constraints, increase collaboration between public and private sectors to improve awareness and service delivery, and evaluate vaccination programs.

Influenza Vaccination — Continued

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Epidemiologic Notes and Reports

Human Rabies — Miami, 1994

A high proportion of recent human rabies cases diagnosed in the United States have been acquired outside the country and have lacked a history of animal bite exposure. On June 21, 1994, a 40-year-old man died in a hospital in Miami following a subacute and progressive neurologic syndrome; rabies had not been clinically suspected but was diagnosed postmortem on July 13. This report summarizes the case investigation, which indicated that the case was acquired outside the United States.

During 1979–1993, the man frequently visited Haiti. After temporarily residing in Haiti during most of 1993, the man returned to Miami in December. During February 1994, he sought medical care for severe neck pain and headache; he was treated as an outpatient and returned to Haiti in March. On April 19, after returning to the United States, he presented to a hospital in Miami with acute renal failure attributed to mild mesangial proliferative glomerular nephritis and was hospitalized. He recovered following hemodialysis and was discharged on April 29.

During May 1994, he made four visits to the hospital's outpatient clinic for different problems, including frontal headache, acute anxiety, epigastric pain, and chest and back pain. During each visit, he also complained of pain in the neck, extremities, or back. Negative diagnostic studies during these visits included an electroencephalogram, electrocardiogram (ECG), and magnetic resonance imaging (MRI).

On June 9, he presented again with a 6-day history of neck pain, headaches, photophobia, feverishness, nausea and vomiting, and right-sided weakness. He was hospitalized and started on ceftriaxone for presumed meningitis. Laboratory studies included a white blood cell count of 10,300/mm^3 (normal: 5000–10,000/mm^3), hemoglobin of 12 g (normal: 14–18 g), and hematocrit of 36 units (normal: 40–54 units); findings were within normal limits for chest radiographs, ECG, and a brain MRI. Cerebrospinal fluid obtained by a lumbar puncture was clear with a protein level of 16 mg/dL and glucose of 111 mg/dL. The patient was started on acyclovir and high-dose steroids for presumed central nervous system vasculitis. Because of progressive lethargy and disorientation, he was admitted to the medical intensive care unit

Rabies — Continued

(MICU); two computed tomographies of the head done on admission on June 9 and again on June 11 were negative for evidence of a cerebrovascular event or meningeal involvement.

The patient's neurologic function continued to deteriorate, and despite mechanical ventilation, he died on June 21. Hypersalivation was not a documented symptom during the clinical course.

On July 13, microscopic examination of brain tissue taken at autopsy showed diffuse, severe encephalomyelitis. Ultrastructural examination of residual neurons detected viral particles consistent with rabies virus. Immunofluorescent antibody staining of formalin-fixed tissue at CDC was strongly suggestive of rabies. On July 21, rabies was confirmed by identification of rabies virus RNA from formalin-fixed brain tissue by reverse transcription-polymerase chain reaction (RT-PCR) amplification with rabies-specific primers. Nucleotide sequence of the RT-PCR product revealed a rabies virus variant sharing 99% homology with a recent dog rabies sample from Haiti; this variant has not been documented in the United States.

Interviews with the patient's family members who resided in Florida indicated that he had not reported an animal bite and that he avoided contact with domestic and wild animals. In addition, they reported that he never had had a pet dog and were unaware of stray dogs in his neighborhood. However, the incubation period, onset of symptoms, travel history, and finding of the rabies virus variant suggest the patient had been exposed to rabies in Haiti during late 1993 or March 1994.

Although postexposure prophylaxis was not indicated for any relatives, 16 hospital personnel (i.e., a morgue technician who cut himself during the autopsy, 10 respiratory therapists, four medical residents, and one nurse in the MICU) received postexposure treatment. The Pan American Health Organization was alerted to contact appropriate Haitian authorities about the case.

Reported by: B Elser, MD, CK Petito, MD, Jackson Memorial Hospital; V Sneller, PhD, ED Sfakianaki, MD, MB Ares, MD, M Edouard, MD, Dade County Public Health Unit; WG Hlady, MD, RS Hopkins, MD, State Epidemiologist, Florida Dept of Health and Rehabilitative Svcs. Viral and Rickettsial Zoonoses Br, Div of Viral and Rickettsial Diseases, National Center for Infectious Diseases, CDC.

Editorial Note: The case described in this report is the 20th case of human rabies to have been reported in the United States since 1980. Of these 20 cases, 10 probably were acquired outside the United States, and 14 had no documented history of animal bite exposure. As a result of exposures to the 20 cases, 832 persons received postexposure rabies prophylaxis, representing an estimated cost of $850,000 (*1*).

In the United States, vaccination programs for pets have reduced the potential for rabies exposure from domestic animals (*2*). In comparison, the occurrence of rabies in dogs remains a common problem in Haiti (*3,4*) and many other developing countries (*3*). Because of the risk for rabies in these countries, travelers are advised to avoid contact with dogs and other animals, and rabies preexposure prophylaxis is recommended for persons planning to stay at least 30 days (*5*).

The case described in this report is the third since 1993 that was diagnosed approximately 1 month postmortem. Rabies should be considered early in the differential diagnosis of rapidly progressive encephalitic syndromes of suspected viral etiology, regardless of whether the patient has a history of an animal bite (*6*). Although early diagnosis alters neither the patient's treatment course nor prognosis, advantages of

Rabies — Continued

this approach include the prompt implementation of appropriate infection-control measures, limitation of the number of persons exposed who require postexposure prophylaxis, and prompt administration of prophylaxis to exposed persons.

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Notice to Readers

CDC Voice/Fax Information Service

In response to the increased need for and use of public health information by health professionals and the public, the CDC Voice/Fax Information Service (CDC VIS) is available. With the CDC VIS, current and comprehensive information on disease risk and prevention strategies may be readily accessed and delivered by telephone voice or fax, 24 hours a day, 365 days a year. The information on the CDC VIS has been prepared by CDC to assure the scientific accuracy and has been scripted to relate to the target populations of callers.

During 1994, the CDC VIS responded to 493,000 requests for voice information and 180,000 fax requests, resulting in the transmission of 432,000 documents totaling 1.3 million pages. Suggestions and comments received from callers have resulted in refinement of the system to make it more usable and tailored to the information needs of the users.

To access the CDC Voice Information System, telephone (404) 332-4555; to access the CDC Fax Information System, telephone (404) 332-4565.

Notice to Readers

International Fluoridation Symposium

CDC is cosponsoring the International Fluoridation Symposium hosted by the British Fluoridation Society in Birmingham, United Kingdom, June 1–2, 1995. The symposium is being held in conjunction with the British Dental Association Annual Conference and will commemorate 50 years of water fluoridation worldwide. Presentations will focus on fluoridation issues, including risks and benefits, technical aspects, the politics of implementation, and developments worldwide.

Additional information is available from Chief Fluoridation Engineer, Program Services Branch, Division of Oral Health, National Center for Prevention Services, CDC, Mailstop F-10, 1600 Clifton Road, NE, Atlanta, GA 30333; telephone (404) 639-8377; fax (404) 639-8617.

AIDS Map

The following map provides information about the reported number of acquired immunodeficiency syndrome (AIDS) cases per 100,000 population by state of residence for July 1993 through June 1994. More detailed information about AIDS cases is provided in the *HIV/AIDS Surveillance Report*, single copies of which are available free from the CDC National AIDS Clearinghouse, P.O. Box 6003, Rockville, MD 20849-6003; telephone (800) 458-5231 or (301) 217-0023.

AIDS cases per 100,000 population — United States, July 1993–June 1994

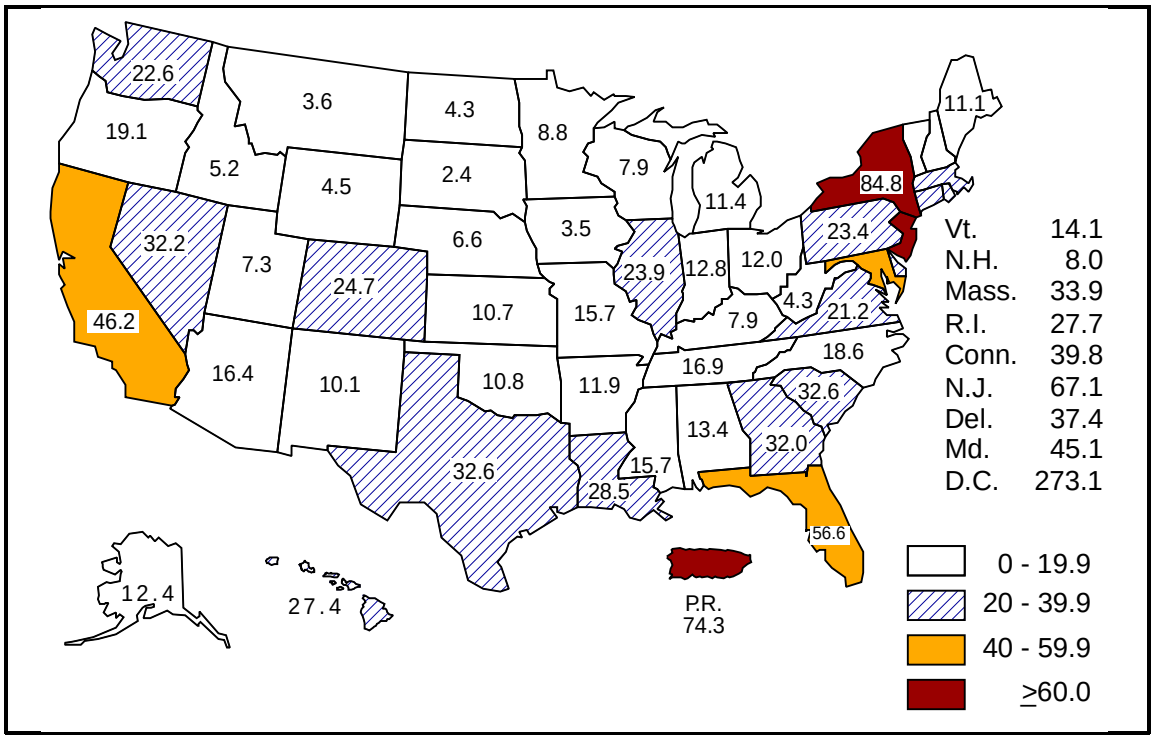
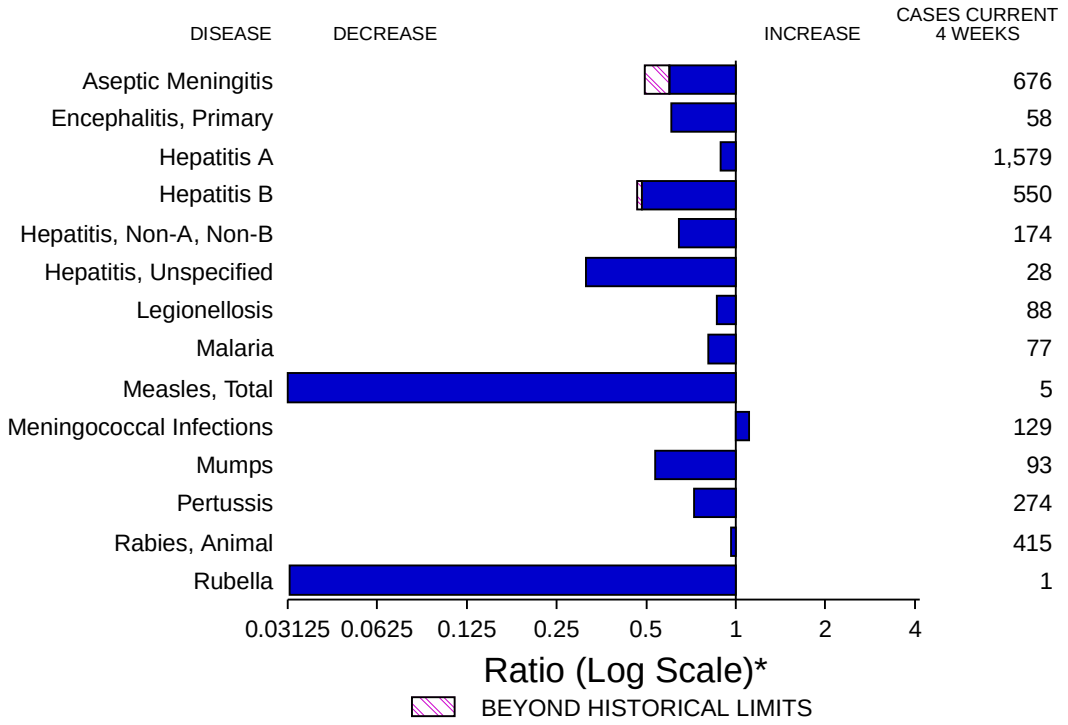


FIGURE I. Notifiable disease reports, comparison of 4-week totals ending October 22, 1994, with historical data — United States



*Ratio of current 4-week total to mean of 15 4-week totals (from previous, comparable, and subsequent 4-week periods for the past 5 years). The point where the hatched area begins is based on the mean and two standard deviations of these 4-week totals.

TABLE I. Summary — cases of specified notifiable diseases, United States, cumulative, week ending October 22, 1994 (42nd Week)

	Cum. 1994		Cum. 1994
AIDS*	61,173	Measles: imported	171
Anthrax	-	indigenous	680
Botulism: Foodborne	45	Plague	14
Infant	55	Poliomyelitis, Paralytic[§]	1
Other	7	Psittacosis	30
Brucellosis	71	Rabies, human	1
Cholera	11	Syphilis, primary & secondary	17,203
Congenital rubella syndrome	3	Syphilis, congenital, age < 1 year[¶]	1,123
Diphtheria	1	Tetanus	28
Encephalitis, post-infectious	91	Toxic shock syndrome	148
Gonorrhea	314,666	Trichinosis	29
Haemophilus influenzae (invasive disease)[†]	934	Tuberculosis	17,571
Hansen Disease	94	Tularemia	76
Leptospirosis	26	Typhoid fever	353
Lyme Disease	8,895	Typhus fever, tickborne (RMSF)	375

*Updated monthly to the Division of HIV/AIDS, National Center for Infectious Diseases; last update September 27, 1994.
[†]Of 889 cases of known age, 246 (28%) were reported among children less than 5 years of age.
[§]The remaining 5 suspected cases with onset in 1994 have not yet been confirmed. In 1993, 3 of 10 suspected cases were confirmed. Two of the confirmed cases of 1993 were vaccine-associated and one was classified as imported.
[¶]Total reported to the Division of Sexually Transmitted Diseases and HIV Prevention, National Center for Prevention Services, through second quarter 1994.

TABLE II. Cases of selected notifiable diseases, United States, weeks ending October 22, 1994, and October 23, 1993 (42nd Week)

Reporting Area	AIDS*	Aseptic Meningitis	Encephalitis		Gonorrhea		Hepatitis (Viral), by type				Legionellosis	Lyme Disease
			Primary	Post-infectious			A	B	NA,NB	Unspecified		
	Cum. 1994	Cum. 1994	Cum. 1994	Cum. 1994	Cum. 1994	Cum. 1993	Cum. 1994	Cum. 1994	Cum. 1994	Cum. 1994	Cum. 1994	Cum. 1994
UNITED STATES	61,173	14,612	534	91	314,666	321,873	18,239	9,232	3,441	345	1,270	8,895
NEW ENGLAND	2,251	247	16	4	7,022	6,227	237	264	111	15	68	2,224
Maine	71	28	3	-	70	70	21	11	-	-	5	17
N.H.	46	26	-	2	92	58	14	20	8	-	-	24
Vt.	29	27	2	-	29	21	8	-	-	-	-	12
Mass.	1,126	69	9	1	2,604	2,457	90	161	83	13	52	192
R.I.	202	97	2	1	380	350	20	7	20	2	11	347
Conn.	777	-	-	-	3,847	3,271	84	65	-	-	-	1,632
MID. ATLANTIC	18,266	723	46	16	36,267	37,430	1,359	1,156	384	9	205	5,457
Upstate N.Y.	1,722	340	27	2	8,432	8,005	444	311	187	5	53	3,336
N.Y. City	10,514	120	6	5	13,353	10,337	548	271	1	-	10	22
N.J.	4,205	-	-	-	3,963	4,249	229	300	165	-	38	1,142
Pa.	1,825	263	13	9	10,519	14,839	138	274	31	4	104	957
E.N. CENTRAL	4,776	1,177	135	22	58,970	67,419	1,807	913	254	8	382	86
Ohio	870	310	48	4	17,402	17,965	750	136	20	-	165	62
Ind.	479	163	10	1	6,923	6,767	307	154	9	-	97	13
Ill.	2,354	274	43	5	14,838	22,632	356	184	51	3	21	4
Mich.	780	423	30	12	14,499	14,631	239	321	171	5	70	7
Wis.	293	7	4	-	5,308	5,424	155	118	3	-	29	-
W.N. CENTRAL	1,244	334	23	6	16,813	17,489	916	528	73	10	81	210
Minn.	300	20	2	-	2,701	1,873	185	48	17	1	1	141
Iowa	88	103	1	1	1,289	1,259	55	24	9	9	28	14
Mo.	566	129	7	4	9,643	10,474	463	406	25	-	28	36
N. Dak.	22	11	3	-	18	43	5	-	-	-	4	-
S. Dak.	12	2	2	-	162	220	31	2	-	-	1	-
Nebr.	69	14	4	1	-	484	89	19	8	-	14	9
Kans.	187	55	4	-	3,000	3,136	88	29	14	-	5	10
S. ATLANTIC	14,441	1,230	129	27	87,494	82,133	1,174	1,923	513	42	299	693
Del.	213	34	1	-	1,577	1,200	16	5	1	-	26	70
Md.	2,356	211	19	4	14,512	13,095	169	340	28	13	79	274
D.C.	1,089	47	-	1	5,906	3,956	19	47	1	-	10	7
Va.	877	251	27	6	10,862	9,618	144	106	21	6	8	119
W. Va.	54	28	41	-	659	546	16	33	24	-	3	21
N.C.	931	201	40	1	23,060	20,315	112	232	52	-	24	75
S.C.	996	28	-	-	10,918	8,785	33	25	8	-	15	7
Ga.	1,688	47	1	-	906	4,660	24	523	171	-	95	100
Fla.	6,237	383	-	15	19,094	19,958	641	612	207	23	39	20
E.S. CENTRAL	1,606	8,655	31	3	37,353	37,224	477	854	729	2	61	38
Ky.	248	144	14	1	4,120	3,934	126	64	23	-	8	21
Tenn.	539	8,313	10	-	11,727	11,496	208	722	691	1	36	11
Ala.	468	153	5	1	12,573	13,336	84	68	15	1	13	6
Miss.	351	45	2	1	8,933	8,458	59	-	-	-	4	-
W.S. CENTRAL	5,837	714	44	2	38,995	36,045	2,679	1,236	474	64	37	102
Ark.	206	39	-	-	5,232	5,807	159	22	7	1	7	8
La.	995	31	7	-	9,931	9,793	131	143	147	1	12	1
Okla.	215	-	-	-	3,035	3,795	295	276	261	1	11	56
Tex.	4,421	644	37	2	20,797	16,650	2,094	795	59	61	7	37
MOUNTAIN	1,751	270	10	3	7,637	9,299	3,452	528	366	50	69	16
Mont.	19	7	-	-	72	64	18	21	12	-	14	-
Idaho	49	6	-	-	73	149	292	68	65	1	1	3
Wyo.	16	4	2	2	67	68	24	23	142	-	4	3
Colo.	658	103	2	-	2,539	3,115	462	87	56	14	15	-
N. Mex.	123	16	-	-	840	765	939	184	45	11	3	8
Ariz.	493	51	-	-	2,528	3,247	1,068	36	11	11	7	-
Utah	102	46	2	1	218	360	454	61	22	3	6	1
Nev.	291	37	4	-	1,300	1,531	195	48	13	10	19	1
PACIFIC	11,001	1,262	100	8	24,115	28,607	6,138	1,830	537	145	68	69
Wash.	730	-	-	-	2,460	3,072	290	60	55	2	7	-
Oreg.	486	-	-	-	570	967	595	69	16	1	-	-
Calif.	9,604	1,141	97	7	19,837	23,573	5,019	1,665	461	139	57	69
Alaska	34	17	3	-	721	512	181	10	-	-	-	-
Hawaii	147	104	-	1	527	483	53	26	5	3	4	-
Guam	1	16	-	-	179	83	42	6	1	12	3	-
P.R.	1,759	27	1	3	370	405	58	303	122	11	-	-
V.I.	39	-	-	-	25	79	-	1	-	-	-	-
Amer. Samoa	-	-	-	-	25	39	7	-	-	-	-	-
C.N.M.I.	-	-	-	-	41	72	6	1	-	-	-	-

N: Not notifiable U: Unavailable C.N.M.I.: Commonwealth of Northern Mariana Islands

*Updated monthly to the Division of HIV/AIDS, National Center for Infectious Diseases; last update September 27, 1994.

TABLE II. (Cont'd.) Cases of selected notifiable diseases, United States, weeks ending October 22, 1994, and October 23, 1993 (42nd Week)

Reporting Area	Malaria	Measles (Rubeola)					Meningococcal Infections	Mumps		Pertussis			Rubella		
		Indigenous		Imported*		Total									
	Cum. 1994	1994	Cum. 1994	1994	Cum. 1994	Cum. 1993	Cum. 1994	1994	Cum. 1994	1994	Cum. 1994	Cum. 1993	1994	Cum. 1994	Cum. 1993
UNITED STATES	860	-	680	-	171	289	2,121	16	1,142	65	2,750	5,038	-	210	168
NEW ENGLAND	67	-	14	-	14	62	110	-	18	5	308	624	-	128	2
Maine	5	-	1	-	4	1	19	-	3	-	18	15	-	-	1
N.H.	3	-	1	-	-	2	6	-	4	-	53	141	-	-	-
Vt.	3	-	2	-	1	31	2	-	-	-	40	79	-	-	-
Mass.	29	-	2	-	6	18	47	-	2	5	161	318	-	124	1
R.I.	8	-	4	-	3	1	-	-	2	-	5	7	-	2	-
Conn.	19	-	4	-	-	9	36	-	7	-	31	64	-	2	-
MID. ATLANTIC	167	-	166	-	23	26	220	1	88	17	486	776	-	9	58
Upstate N.Y.	42	-	12	-	3	7	80	1	25	3	199	278	-	6	16
N.Y. City	61	-	11	-	3	10	11	-	11	14	106	57	-	1	22
N.J.	38	-	139	-	14	9	52	-	6	-	10	75	-	2	15
Pa.	26	-	4	-	3	-	77	-	46	-	171	366	-	-	5
E.N. CENTRAL	92	-	58	-	44	31	335	5	194	15	353	1,282	-	11	7
Ohio	15	-	15	-	2	9	95	5	58	9	132	365	-	-	1
Ind.	14	U	-	U	1	1	57	U	7	U	53	118	U	-	2
Ill.	38	-	17	-	39	9	104	-	88	-	76	384	-	3	1
Mich.	23	-	23	-	2	6	47	-	37	6	43	91	-	8	2
Wis.	2	-	3	-	-	6	32	-	4	-	49	324	-	-	1
W.N. CENTRAL	39	-	126	-	44	3	146	1	60	2	146	470	-	2	1
Minn.	12	-	-	-	-	-	12	-	5	-	51	270	-	-	-
Iowa	5	-	6	-	1	-	18	-	15	1	18	35	-	-	-
Mo.	12	-	118	-	42	1	78	1	33	-	39	124	-	2	1
N. Dak.	1	-	-	-	-	-	1	-	5	-	4	5	-	-	-
S. Dak.	-	-	-	-	-	-	8	-	-	1	17	8	-	-	-
Nebr.	3	U	1	U	1	-	9	U	2	U	7	12	U	-	-
Kans.	6	-	1	-	-	2	20	-	-	-	10	16	-	-	-
S. ATLANTIC	194	-	57	-	8	28	361	-	160	9	252	488	-	11	6
Del.	3	-	-	-	-	-	5	-	-	1	3	9	-	-	-
Md.	94	-	2	-	2	4	35	-	53	3	71	113	-	-	2
D.C.	14	-	-	-	-	-	4	-	-	-	8	13	-	-	-
Va.	29	-	1	-	2	4	58	-	38	1	36	52	-	-	-
W. Va.	-	-	36	-	-	-	12	-	3	-	4	8	-	-	-
N.C.	11	-	2	-	1	-	44	-	35	-	58	100	-	-	-
S.C.	4	-	-	-	-	-	22	-	7	-	13	64	-	-	-
Ga.	20	-	2	-	-	-	66	-	8	-	22	50	-	2	-
Fla.	19	-	14	-	3	20	115	-	16	4	37	79	-	9	4
E.S. CENTRAL	29	-	28	-	-	1	123	-	19	1	115	266	-	-	-
Ky.	10	-	-	-	-	-	34	-	-	1	59	36	-	-	-
Tenn.	9	-	28	-	-	-	27	-	7	-	18	162	-	-	-
Ala.	9	-	-	-	-	1	62	-	5	-	31	58	-	-	-
Miss.	1	-	-	-	-	-	-	-	7	-	7	10	-	-	-
W.S. CENTRAL	40	-	10	-	7	10	263	7	223	1	179	135	-	13	17
Ark.	3	-	-	-	1	-	39	-	1	-	27	10	-	-	-
La.	8	-	-	-	1	1	32	1	25	-	10	11	-	-	1
Okla.	6	-	-	-	-	-	27	-	23	1	25	72	-	4	1
Tex.	23	-	10	-	5	9	165	6	174	-	117	42	-	9	15
MOUNTAIN	26	-	149	-	17	6	135	-	138	2	322	361	-	6	11
Mont.	-	-	-	-	-	-	6	-	-	1	8	7	-	-	-
Idaho	2	-	1	-	-	-	16	-	7	-	45	92	-	-	2
Wyo.	1	-	-	-	-	-	7	-	2	-	-	1	-	-	-
Colo.	11	-	16	-	3	3	27	-	3	1	110	141	-	-	2
N. Mex.	3	-	-	-	-	-	13	N	N	-	20	36	-	1	-
Ariz.	3	-	1	-	1	2	42	-	89	-	116	50	-	-	2
Utah	4	-	131	-	2	-	18	-	23	-	20	30	-	4	4
Nev.	2	-	-	-	11	1	6	-	13	-	3	4	-	1	1
PACIFIC	206	-	72	-	14	122	428	2	242	13	589	636	-	30	66
Wash.	10	-	-	-	-	-	28	-	7	-	29	61	-	-	-
Oreg.	11	-	-	-	1	4	79	N	N	-	38	58	-	2	-
Calif.	167	-	56	-	9	96	312	2	215	12	503	506	-	23	37
Alaska	2	-	16	-	-	2	2	-	3	-	1	5	-	1	1
Hawaii	16	-	-	-	4	20	7	-	17	1	18	6	-	4	28
Guam	3	U	211	U	-	2	1	U	4	U	2	-	U	1	-
P.R.	2	-	13	-	-	348	15	-	2	-	1	8	-	-	-
V.I.	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-
Amer. Samoa	-	-	-	-	-	-	-	-	1	-	2	2	-	-	-
C.N.M.I.	1	U	26	U	-	1	-	U	2	U	-	1	U	-	-

*For measles only, imported cases include both out-of-state and international importations.
N: Not notifiable U: Unavailable † International § Out-of-state

TABLE II. (Cont'd.) Cases of selected notifiable diseases, United States, weeks ending October 22, 1994, and October 23, 1993 (42nd Week)

Reporting Area	Syphilis (Primary & Secondary)		Toxic-Shock Syndrome	Tuberculosis		Tula-remia	Typhoid Fever	Typhus Fever (Tick-borne) (RMSF)	Rabies, Animal
	Cum. 1994	Cum. 1993	Cum. 1994	Cum. 1994	Cum. 1993	Cum. 1994	Cum. 1994	Cum. 1994	Cum. 1994
UNITED STATES	17,203	21,513	148	17,571	18,194	76	353	375	5,094
NEW ENGLAND	176	272	4	429	408	1	21	15	1,568
Maine	4	5	1	23	21	-	-	-	-
N.H.	3	24	-	15	15	-	-	-	167
Vt.	-	1	1	6	5	-	-	-	115
Mass.	77	112	2	236	222	1	17	7	591
R.I.	12	12	-	35	48	-	1	-	44
Conn.	80	118	-	114	97	-	3	8	651
MID. ATLANTIC	1,116	1,875	24	3,440	3,754	1	96	17	631
Upstate N.Y.	141	182	14	259	567	1	10	6	207
N.Y. City	506	905	-	2,104	2,182	-	64	1	-
N.J.	163	245	-	636	460	-	17	4	226
Pa.	306	543	10	441	545	-	5	6	198
E.N. CENTRAL	2,251	3,459	30	1,700	1,849	8	68	44	52
Ohio	925	903	9	280	260	1	7	27	4
Ind.	199	305	2	154	182	2	7	5	12
Ill.	628	1,346	9	857	967	3	42	10	16
Mich.	232	478	10	363	365	1	5	2	12
Wis.	267	427	-	46	75	1	7	-	8
W.N. CENTRAL	964	1,354	22	462	394	34	1	32	170
Minn.	42	54	1	104	50	1	-	-	13
Iowa	51	58	8	48	41	-	-	1	71
Mo.	819	1,124	6	203	204	22	1	14	17
N. Dak.	-	4	1	7	6	1	-	-	9
S. Dak.	-	2	-	21	12	1	-	13	29
Nebr.	-	10	2	18	21	2	-	1	-
Kans.	52	102	4	61	60	7	-	3	31
S. ATLANTIC	5,014	5,496	7	3,258	3,685	2	44	179	1,616
Del.	22	90	-	26	39	-	1	-	41
Md.	248	299	-	268	322	1	12	20	443
D.C.	179	273	-	100	139	-	1	-	2
Va.	652	532	1	255	369	-	8	17	332
W. Va.	8	11	-	67	61	-	-	2	64
N.C.	1,386	1,574	1	397	431	-	-	66	138
S.C.	674	811	-	294	327	-	-	17	149
Ga.	1,210	903	1	627	620	1	2	54	313
Fla.	635	1,003	4	1,224	1,377	-	20	3	134
E.S. CENTRAL	3,150	3,335	4	1,153	1,347	1	2	29	156
Ky.	175	287	2	259	304	1	1	8	18
Tenn.	822	946	2	360	424	-	1	15	34
Ala.	551	685	-	353	411	-	-	2	104
Miss.	1,602	1,417	-	181	208	-	-	4	-
W.S. CENTRAL	3,716	4,525	1	2,441	2,122	17	14	45	548
Ark.	388	462	-	224	158	16	-	8	25
La.	1,430	2,110	-	138	203	-	3	-	62
Okla.	111	243	1	219	129	1	2	30	31
Tex.	1,787	1,710	-	1,860	1,632	-	9	7	430
MOUNTAIN	198	203	7	395	436	9	9	14	120
Mont.	4	1	-	9	13	3	-	4	15
Idaho	1	-	1	11	12	-	-	-	3
Wyo.	1	7	-	8	4	-	-	2	19
Colo.	105	63	4	21	65	1	3	4	12
N. Mex.	18	24	-	43	46	1	1	2	6
Ariz.	33	85	-	188	186	-	1	1	41
Utah	8	9	2	38	25	2	2	-	15
Nev.	28	14	-	77	85	2	2	1	9
PACIFIC	618	994	49	4,293	4,199	3	98	-	233
Wash.	30	50	2	216	211	-	3	-	-
Oreg.	21	37	-	90	-	2	5	-	9
Calif.	561	893	43	3,729	3,730	-	85	-	194
Alaska	4	8	-	51	48	1	-	-	30
Hawaii	2	6	4	207	210	-	5	-	-
Guam	9	3	-	142	48	-	1	-	-
P.R.	249	418	-	137	165	-	-	-	55
V.I.	25	37	-	-	2	-	-	-	-
Amer. Samoa	1	-	-	4	4	-	1	-	-
C.N.M.I.	2	3	-	31	29	-	1	-	-

U: Unavailable

TABLE III. Deaths in 121 U.S. cities,* week ending October 22, 1994 (42nd Week)

Reporting Area	All Causes, By Age (Years)						P&I† Total
	All Ages	≥65	45-64	25-44	1-24	<1	
NEW ENGLAND	581	398	107	52	16	8	43
Boston, Mass.	174	103	40	23	4	4	14
Bridgeport, Conn.	34	24	5	3	2	-	1
Cambridge, Mass.	26	18	5	-	3	-	7
Fall River, Mass.	22	19	3	-	-	-	-
Hartford, Conn.	73	49	14	7	2	1	2
Lowell, Mass.	20	14	4	2	-	-	1
Lynn, Mass.	17	12	3	1	-	1	-
New Bedford, Mass.	16	13	1	2	-	-	1
New Haven, Conn.	32	20	4	7	1	-	1
Providence, R.I.	22	17	5	-	-	-	1
Somerville, Mass.	10	9	-	1	-	-	-
Springfield, Mass.	38	22	8	3	3	2	3
Waterbury, Conn.	33	28	4	1	-	-	2
Worcester, Mass.	64	50	11	2	1	-	10
MID. ATLANTIC	2,587	1,676	491	310	58	52	105
Albany, N.Y.	46	36	5	3	1	1	5
Allentown, Pa.	24	20	4	-	-	-	1
Buffalo, N.Y.	111	81	21	7	1	1	4
Camden, N.J.	52	36	3	3	7	3	3
Elizabeth, N.J.	23	16	4	3	-	-	1
Erie, Pa.§	47	39	2	3	1	2	2
Jersey City, N.J.	34	22	3	7	-	2	-
New York City, N.Y.	1,378	855	287	178	29	29	36
Newark, N.J.	71	28	23	16	-	4	3
Paterson, N.J.	24	13	6	5	-	-	1
Philadelphia, Pa.	317	183	65	54	11	4	19
Pittsburgh, Pa.§	79	62	12	4	1	-	6
Reading, Pa.	19	14	3	2	-	-	2
Rochester, N.Y.	146	103	23	14	4	2	7
Schenectady, N.Y.	26	19	4	2	1	-	1
Scranton, Pa.§	32	29	2	1	-	-	4
Syracuse, N.Y.	97	71	14	6	2	4	10
Trenton, N.J.	U	U	U	U	U	U	U
Utica, N.Y.	24	20	3	1	-	-	-
Yonkers, N.Y.	37	29	7	1	-	-	-
E.N. CENTRAL	2,221	1,402	411	237	109	62	105
Akron, Ohio	55	34	12	6	1	2	-
Canton, Ohio	46	32	10	2	-	2	3
Chicago, Ill.	403	169	77	86	56	15	8
Cincinnati, Ohio	143	96	29	8	3	7	7
Cleveland, Ohio	158	107	28	18	3	2	3
Columbus, Ohio	170	102	40	19	5	4	13
Dayton, Ohio	101	72	19	5	3	2	4
Detroit, Mich.	243	145	46	35	11	6	5
Evansville, Ind.	42	31	5	4	1	1	3
Fort Wayne, Ind.	58	47	8	3	-	-	2
Gary, Ind.	23	12	4	4	2	1	-
Grand Rapids, Mich.	69	49	8	2	7	3	12
Indianapolis, Ind.	181	117	39	14	8	3	16
Madison, Wis.	57	42	9	3	2	1	6
Milwaukee, Wis.	140	106	19	11	1	3	9
Peoria, Ill.	43	29	9	2	-	3	4
Rockford, Ill.	50	34	9	2	2	3	4
South Bend, Ind.	52	41	5	3	1	2	1
Toledo, Ohio	110	83	18	7	2	-	5
Youngstown, Ohio	77	54	17	3	1	2	-
W.N. CENTRAL	722	504	101	52	19	22	33
Des Moines, Iowa	51	30	13	-	1	1	4
Duluth, Minn.	27	16	7	3	-	1	2
Kansas City, Kans.	26	16	5	2	2	1	1
Kansas City, Mo.	101	58	12	7	3	3	5
Lincoln, Nebr.	16	11	2	3	-	-	2
Minneapolis, Minn.	186	144	16	14	5	7	13
Omaha, Nebr.	79	56	10	9	1	3	4
St. Louis, Mo.	123	83	19	10	6	5	-
St. Paul, Minn.	60	44	12	3	-	1	2
Wichita, Kans.	53	46	5	1	1	-	-

Reporting Area	All Causes, By Age (Years)						P&I† Total
	All Ages	≥65	45-64	25-44	1-24	<1	
S. ATLANTIC	1,253	757	267	140	42	45	59
Atlanta, Ga.	162	95	36	24	3	4	1
Baltimore, Md.	187	113	42	27	3	2	16
Charlotte, N.C.	73	45	14	8	4	2	4
Jacksonville, Fla.	115	75	27	10	1	2	9
Miami, Fla.	103	57	23	15	3	5	-
Norfolk, Va.	56	31	10	8	2	5	4
Richmond, Va.	81	51	19	6	3	2	3
Savannah, Ga.	56	31	14	4	5	2	2
St. Petersburg, Fla.	42	31	7	1	1	2	2
Tampa, Fla.	178	122	32	12	6	5	10
Washington, D.C.	190	99	40	25	11	14	8
Wilmington, Del.	10	7	3	-	-	-	-
E.S. CENTRAL	770	486	172	62	33	17	46
Birmingham, Ala.	124	80	28	10	4	2	7
Chattanooga, Tenn.	74	51	17	2	4	-	4
Knoxville, Tenn.	72	43	22	3	2	2	4
Lexington, Ky.	67	37	19	3	5	3	5
Memphis, Tenn.	131	86	24	12	7	2	7
Mobile, Ala.	121	67	31	13	7	3	2
Montgomery, Ala.	47	35	6	5	-	1	5
Nashville, Tenn.	134	87	25	14	4	4	12
W.S. CENTRAL	1,364	838	280	157	56	33	90
Austin, Tex.	83	59	15	5	-	4	5
Baton Rouge, La.	39	30	7	1	1	-	-
Corpus Christi, Tex.	U	U	U	U	U	U	U
Dallas, Tex.	215	130	45	23	14	3	7
El Paso, Tex.	88	48	23	11	3	3	4
Ft. Worth, Tex.	91	61	16	10	2	2	4
Houston, Tex.	314	183	60	50	12	9	27
Little Rock, Ark.	61	33	15	5	6	2	2
New Orleans, La.	101	51	19	22	8	1	-
San Antonio, Tex.	201	123	45	21	8	4	23
Shreveport, La.	81	56	15	5	2	3	13
Tulsa, Okla.	90	64	20	4	-	2	5
MOUNTAIN	806	578	112	78	23	15	58
Albuquerque, N.M.	117	86	16	13	1	1	7
Colo. Springs, Colo.	43	31	8	3	1	-	4
Denver, Colo.	107	72	13	14	4	4	10
Las Vegas, Nev.	114	77	30	6	1	-	5
Ogden, Utah	17	12	2	3	-	-	1
Phoenix, Ariz.	148	108	6	20	9	5	14
Pueblo, Colo.	30	26	3	-	1	-	2
Salt Lake City, Utah	100	66	17	10	4	3	10
Tucson, Ariz.	130	100	17	9	2	2	5
PACIFIC	1,889	1,220	329	231	54	30	121
Berkeley, Calif.	15	9	3	1	-	2	1
Fresno, Calif.	93	63	16	5	5	4	3
Glendale, Calif.	27	20	4	3	-	-	2
Honolulu, Hawaii	75	53	11	7	3	1	5
Long Beach, Calif.	51	36	9	5	1	-	7
Los Angeles, Calif.	519	301	95	81	30	1	14
Pasadena, Calif.	25	18	3	3	-	1	4
Portland, Oreg.	179	111	34	26	3	5	9
Sacramento, Calif.	172	113	31	21	4	3	15
San Diego, Calif.	96	68	18	8	2	-	12
San Francisco, Calif.	141	79	24	22	-	2	20
San Jose, Calif.	162	115	24	16	3	4	17
Santa Cruz, Calif.	28	20	5	3	-	-	2
Seattle, Wash.	159	109	26	18	2	4	2
Spokane, Wash.	58	43	5	9	-	1	4
Tacoma, Wash.	89	62	21	3	1	2	4
TOTAL	12,193¶	7,859	2,270	1,319	410	284	660

*Mortality data in this table are voluntarily reported from 121 cities in the United States, most of which have populations of 100,000 or more. A death is reported by the place of its occurrence and by the week that the death certificate was filed. Fetal deaths are not included.

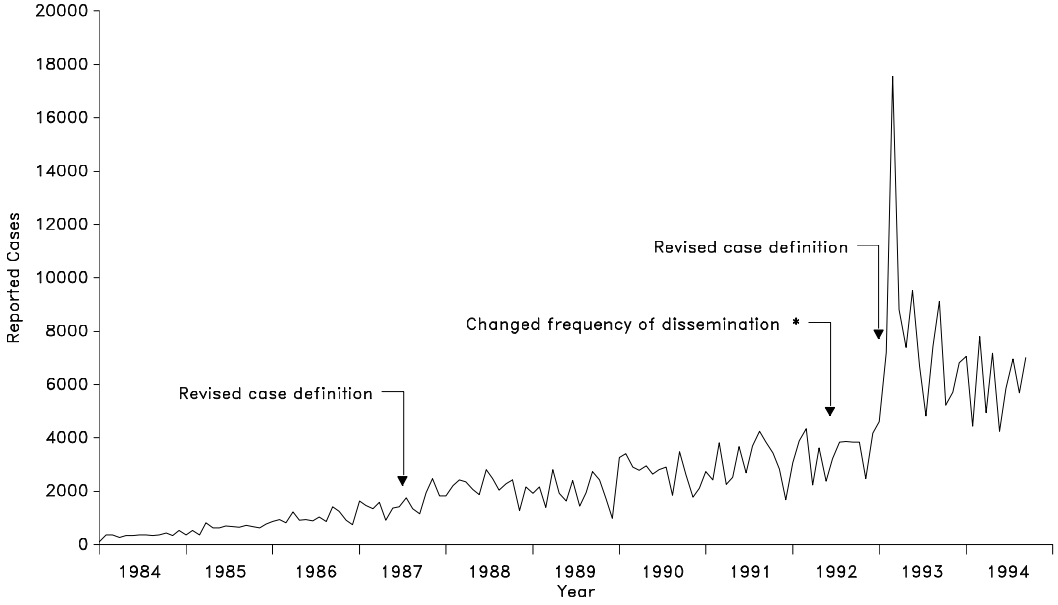
†Pneumonia and influenza.

§Because of changes in reporting methods in these 3 Pennsylvania cities, these numbers are partial counts for the current week. Complete counts will be available in 4 to 6 weeks.

¶Total includes unknown ages.

U: Unavailable.

FIGURE II. Acquired immunodeficiency syndrome cases, by 4-week period of report — United States, 1984–1994



*Change to reflect Notice to Readers, Vol. 41, No. 18, pg. 325.

FIGURE III. Tuberculosis cases, by 4-week period of report — United states, 1984–1994

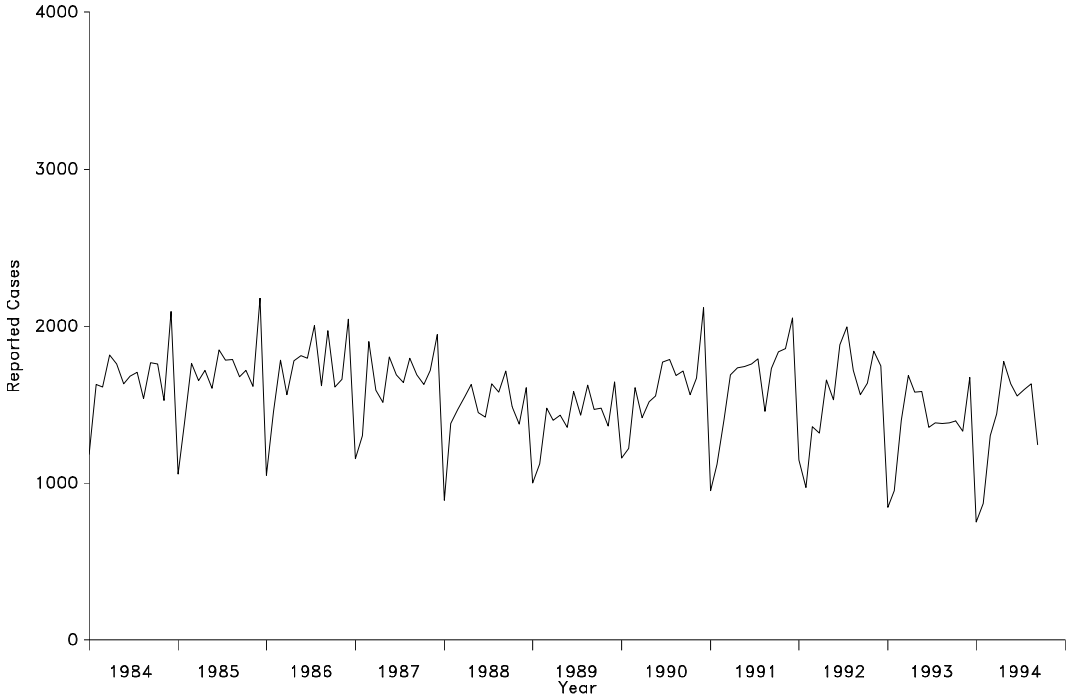


FIGURE IV. Gonorrhea cases, by 4-week period of report — United States, 1984–1994

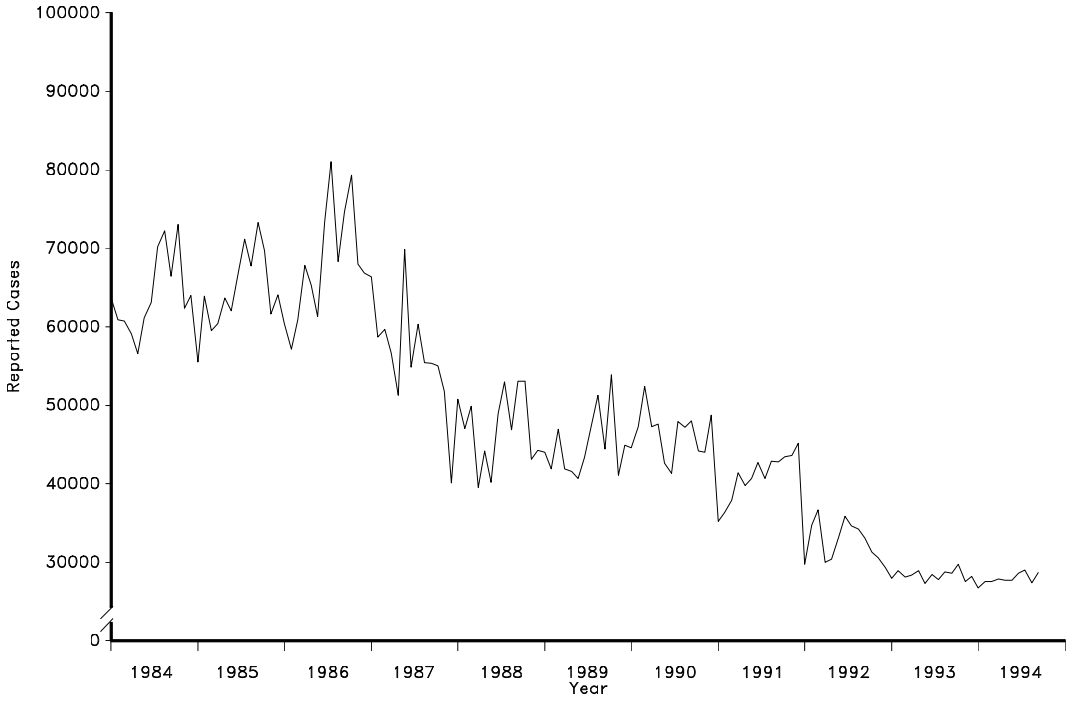
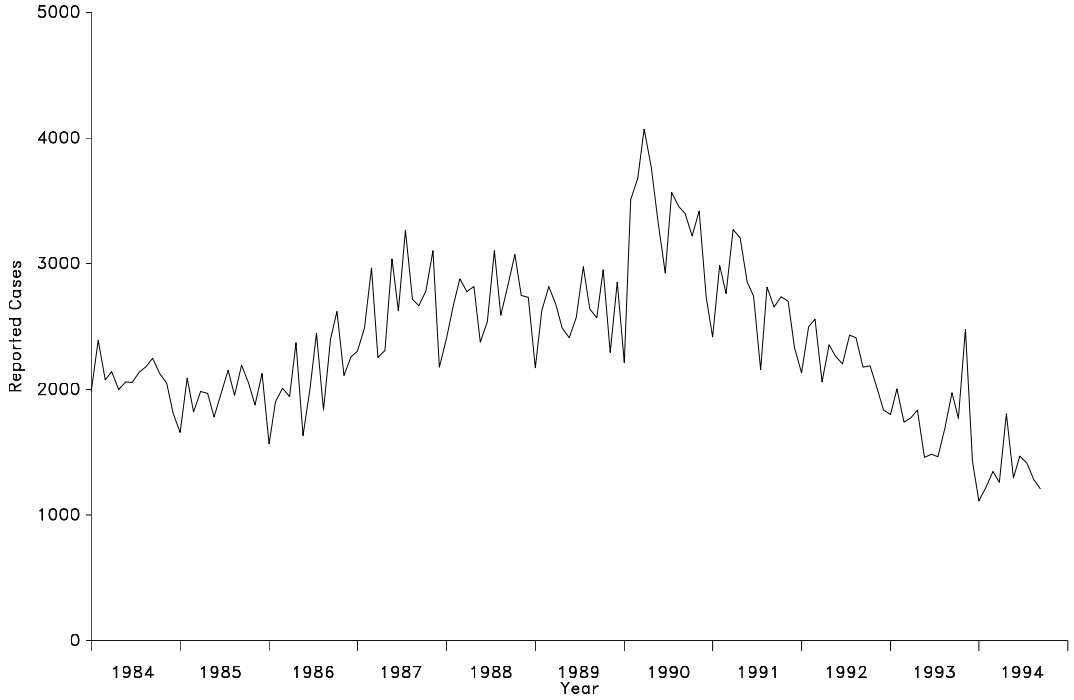


FIGURE V. Syphilis cases, by 4-week period of report — United States, 1984–1994



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