

Current Trends

Influenza — United States

Since November 1979, influenza B viruses have been isolated in 15 states. In addition to earlier reports (1,2), influenza B was isolated in Alaska, Michigan, New York, Ohio, and Washington from patients in localized outbreaks or patients with sporadic illnesses occurring between December 17 and January 2. Isolation of influenza B viruses, previously reported from Hawaii in July through October 1979 (3), continued sporadically in November and December. Infections occurred primarily among children, but viruses were also isolated from adults, including the elderly. No widespread outbreaks of influenza-like illness have been reported in the United States, although regional outbreaks of influenza-like activity were reported by Idaho and Oregon for the week ending January 5.

Reye syndrome associated with influenza B infection was reported in a 10-year-old girl in Oregon and in an 11-year-old boy in Ohio, both of whom had onset of illness in December.

An influenza A/Texas/1/77(H3N2)-like strain was also isolated, from a specimen obtained on December 26 from a 14-year-old boy in Chicago. This appeared to be a sporadic case.

Reported by D Ritter, DF Tirador, MD, State Epidemiologist, Alaska State Dept of Health and Social Services; M Beem, MD, Dept of Pediatrics, University of Chicago; BJ Francis, MD, State Epidemiologist, Illinois State Dept of Public Health; G Kobayashi, Virology Section, NH Wiebenga, MD, State Epidemiologist, Hawaii Dept of Health; J Allard, PhD, Laboratory Section, JW Taylor, MD, State Epidemiologist, Washington State Dept of Social and Health Services; M Kaplan, MD, Nassau County Medical Center, New York; R Rothenberg, MD, State Epidemiologist, New York State Dept of Health; D Nelson, JP Davis, State Epidemiologist, Wisconsin State Dept of Health and Social Services; State Epidemiologists for Michigan, Ohio, and Oregon; WHO Collaborating Center for Influenza, Virology Div, Bur of Laboratories, Immunization Div, Bur of State Services, CDC.

References

1. MMWR 1979;28:602.
2. MMWR 1979;28:619-20.
3. MMWR 1979;28:523-24.

Epidemiologic Notes and Reports

Asbestos Exposure — Globe, Arizona

Two miles east of Globe, Arizona, is a 44-home mobile housing subdivision with approximately 120 residents. The subdivision was built in 1973 on the property of a currently inactive asbestos mill, and mill tailings were used as landfill during the initial grading of the site. The abandoned mill building still stands in the midst of the subdivision, with asbestos-laden equipment indoors and small piles of asbestos tailings outdoors. The 35-40 children in the area and others have ready access to these materials and have been observed playing in asbestos-containing soil.

An active, operating mill is situated 1,000 feet to the east and upwind of the mobile homes, with a large pile of asbestos tailings approximately 1,500 feet from the homes. Visible airborne dust arising from these sites is noted by residents of the subdivision during mill operation and on windy days.

In a preliminary study conducted by the Arizona State Department of Health Services in December 1979 and January 1980, selected samples of surface soil from 44 of the 50 mobile home lots contained asbestos in concentrations ranging from 5% to 60%. Initial indoor air samples revealed concentrations of asbestos fibers (>5 microns) which ranged from <0.01 fibers/cc to 0.05 fibers/cc in the undisturbed state; concentrations ranged as

Asbestos Exposure – Continued

high as 0.35 fibers/cc during household activities such as vacuuming. (The current occupational asbestos standard recommended by the National Institute for Occupational Safety and Health [NIOSH] is 0.1 fibers/cc for an 8-hour, time-weighted average [1].) Initial studies of the water supply did not reveal asbestos fibers.

More detailed environmental monitoring (including electron microscopy for specific fiber determinations) and evaluation of asbestos exposure in this community are underway. The state of Arizona has requested the involved mill property owners to develop plans for covering over the asbestos tailings to limit further releases. Plans to expeditiously evacuate the residents of the subdivision are underway.

Reported by A Kelter, MD, B Scott, PE, K Starko, MD, Acting State Epidemiologist, Arizona State Dept of Health Services; Industrywide Studies Br, NIOSH, and Chronic Diseases Div, Bur of Epidemiology, CDC.

Editorial Note: The known long-term risks associated with asbestos include asbestosis, lung cancer, gastrointestinal cancer, and mesothelioma (the latter reported even after relatively brief exposures and unrelated to smoking patterns) (2,3). Children are of particular concern because of their long life expectancy. It should be noted that the NIOSH recommended standard was not designed for the population-at-large, which may be exposed up to 24 hours per day, or for children playing directly with asbestos-containing materials.

References

1. NIOSH. Revised recommended asbestos standard. DHEW (NIOSH) Publication No. 77-196. Washington, DC: U.S. Government Printing Office, 1976.
2. Bogovski P, Gilson JC, Timbrell V, Wagner JC, eds. Biological effects of asbestos. Lyon, International Agency for Research on Cancer, 1973. (IARC scientific publication no. 8).
3. Anderson H, Lilis R, Daum SM, Fischbein AS, Selikoff IJ. Household exposure to asbestos and risk of subsequent disease. In: Lemen RA, Dement JM, eds. Dusts and disease: occupational and environmental exposure to selected fibrous and particulate dusts. Park Forest South, Ill.: Pathotox Publishers Inc., 1979:145-56.

**U.S. DEPARTMENT OF HEALTH, EDUCATION, AND WELFARE
PUBLIC HEALTH SERVICE / CENTER FOR DISEASE CONTROL
ATLANTA, GEORGIA 30333 OFFICIAL BUSINESS**

Director, Center for Disease Control

William H. Foege, M.D.

Director, Bureau of Epidemiology

Philip S. Brachman, M.D.

Editor

Michael B. Gregg, M.D.

Managing Editor

Anne D. Mather, M.A.

Mathematical Statistician

Keewhan Choi, Ph.D.

Postage and Fees Paid
U.S. Department of HEW
HEW 396



4CA55 MILLSMA0007097921SXXX
MRS MARY ALICE MILLS
DIRECTOR, LIBRARY
BLDG 1-4007

MMWR

MORBIDITY AND MORTALITY WEEKLY REPORT

Epidemiologic Notes and Reports

January 18, 1980 / Vol. 29 / No. 2

Epidemiologic Notes and Reports

- 13 Military to Civilian Transmission of Measles — Illinois, Nebraska
- 15 Successful Programs to Prevent Pregnancy in Adolescents
- 21 Measles and Measles Vaccine Reactions Among College Students — Wisconsin
- 23 Asbestos Exposure — Globe, Arizona
Current Trends
- 23 Influenza — United States

JAN 18 1980

Military to Civilian Transmission of Measles — Illinois, Nebraska

In several states, detailed case investigations of the source and spread associated with each reported case of measles have become an important component of efforts to eliminate the disease. During 1979, cases or outbreaks of measles among civilians and military dependents were traced to exposures to military personnel at bases in Alabama, Georgia, Illinois, Kentucky, and Missouri. Below are details of such outbreaks in 2 states—Illinois and Nebraska.

Illinois: On November 9, a 27-year-old pregnant employee at a day-care center at the Great Lakes Naval Base in Lake County, Illinois, had onset of a measles-like rash. Two weeks before, she had visited a dispensary for ill recruits located on the base, where her husband worked; several measles cases had been seen there. This employee normally worked with older children, but on November 7, during her prodrome, she substituted in the room where children aged 6-18 months are cared for.

By December 31, a total of 16 cases had occurred among enrolled children at the day-care center, which has a regular attendance of 157 (Figure 1A). The outbreak was almost entirely confined to the 13 unimmunized children 6-18 months of age who regularly attended the day-care center: they had an attack rate of 77%. Only 6 cases occurred in the older, regularly enrolled children, and 2 cases in children who attended irregularly. The overall vaccination level among enrolled children older than 15 months exceeded 95%. Subsequently, a second outbreak of 8 cases occurred at a local elementary school (School A, Figure 1A). The apparent source was a 6-year-old girl who attended both the day-care center and the school. She had been vaccinated at 9 months of age.

On October 27, a 5-year-old girl from a different elementary school (School B) was hospitalized for measles at the Navy Regional Medical Center (NRMC) located on the base. On October 11, while visiting NRMC for another medical problem, she was presumably exposed to other measles patients. Ten additional cases occurred in her schoolmates and playmates (Figure 1B).

Further investigation revealed that measles was endemic at the base among recruits and other young trainees during 1979. Measles in military personnel accounted for 153 of the 165 cases (93%) reported by Lake County through August 1979. Several additional instances of probable spread from this military focus to the civilian population were uncovered. Six unrelated cases in military dependents are believed to have been acquired at the NRMC. There was no known secondary spread. All 6 were in military dependents (Figure 1C). Four of these—2 hospitalized dependents and 2 young adults who visited hospitalized patients—are thought to have been exposed to recruits hospitalized for measles. The other 2 were children who attended the NRMC outpatient pediatric clinic and presumably were exposed there to children from the day-care center who were being treated for measles.