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Perspectives in Disease Prevention and Health Promotion

Implementing the 1990 Prevention Objectives: Summary of CDC's Seminar

In the publication, *Promoting Health/Preventing Disease: Objectives for the Nation* (*1*), the U.S. Public Health Service (PHS) established 226 measurable objectives in 15 priority areas to be achieved by 1990: high blood pressure control, family planning, pregnancy and infant health, immunization, sexually transmitted disease control, toxic agent control, occupational safety and health, injury control, fluoridation and dental health, infectious disease surveillance and control, smoking and health, alcohol and drug misuse, nutrition, physical fitness and exercise, and stress and violent behavior control. In developing these objectives, PHS drew on the expertise of over 500 individuals from the public and private sectors, representing federal agencies and departments, state and local health agencies, consumer groups, volunteer organizations, and academic and other health professionals.

CDC was given the lead responsibility within PHS for working with state and local health departments in developing comparable objectives tailored to the needs of their populations and in implementing prevention activities. As part of its effort to work with the states on the 1990 Objectives, CDC convened a seminar on September 23-24, 1982, in Atlanta, Georgia, with two major objectives: 1) to determine how PHS can assist state, county, and city health officials and health professionals in achieving the 1990 Objectives for the Nation; and 2) to consider methods of fostering collaboration among the academic community, non-governmental public health organizations, and governmental public health agencies directed toward achieving the national prevention goals.

The 200 seminar participants represented a cross-section of U.S. medical and public health organizations, including: the Association of State and Territorial Health Officials, the National Association of County Health Officials, and the U.S. Conference of City Health Officers; the academic community, including the Association of Schools of Public Health and the Association of Teachers of Preventive Medicine; and public health and professional associations, such as the American Public Health Association, the American Rural Health Association, the American Academy of Pediatrics, and the American Conference of Governmental Industrial Hygienists. Representatives from all PHS agencies and state and local participants from different geographic areas (e.g., California, Michigan, Pennsylvania, Texas, and Utah) also attended.

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Presidents of state, city, and county health officers' associations described how their states and communities use the 1990 Objectives and how actions and resources needed by state and local health agencies can achieve these Objectives. A number of states—including California, Connecticut, Georgia, Minnesota, and Utah—have adopted the national Objectives as part of their process for setting state priorities. To develop performance standards for their local health programs, Seattle, Washington, and Birmingham, Alabama, have analyzed the 1990 Objectives and the *Model Standards for Community Preventive Health Services* (*2*).

Among the important needs identified by health officials were: information exchange among federal, state, and community agencies; improved state surveillance systems and data analyses to track progress toward the Objectives; scientific expertise and technical consultation; multi-city intervention trials; research on cost-effective prevention measures; professional training; stronger links between Medicaid and state public health programs; and support for extending health promotion programs to vulnerable populations in both urban and rural areas. After the health officers' panel, brief presentations by leaders of professional associations and the academic community opened the general discussion. The issues were examined in more detail during work group sessions.

The seven work groups were organized according to priority areas identified in *Promoting Health/Preventing Disease: Objectives for the Nation*: Fluoridation and Dental Health, Health Promotion, Immunization, Injury Control, Occupational Safety and Health/Toxic Agent Control, Sexually Transmitted Disease Control, and Surveillance and Control of Infectious Diseases. The work groups' recommendations can be summarized into seven categories:

1. Operational research and evaluation of intervention strategies: PHS epidemiologic studies and demonstration and evaluation projects are needed to identify prevention opportunities, to test the feasibility of possible interventions, and to assess and compare the effectiveness of different prevention strategies. Such studies would identify: behavioral risk factors, illnesses related to toxic exposures in the community and workplace, injury-related risk factors and injury control strategies, and additional cost-effective methods for controlling sexually transmitted diseases. They would also evaluate new and existing vaccines and develop new technology for the control of hospital infection.

2. Technical assistance in the development of programmatic data: All work groups identified the need to develop improved surveillance methods and uniform data definitions (e.g., age groups, race). State and local health officials encouraged PHS to assist in developing data collection methods and in analyzing data assessing the extent of preventable health problems, identifying target populations, and determining the effectiveness of particular interventions. Results of these data analyses could then be applied to programs implemented at the state and local levels. Among the identified data needs were the development of state injury-surveillance systems, surveys to monitor serious dental health problems, surveillance of occupational injuries and health effects of exposure to toxic substances, and applications of the results of state surveys on the prevalence of behavioral risk factors.

3. Information interpretation and transfer: Seminar participants viewed PHS as a national repository for scientific information on prevention-related subjects. Work groups recommended that PHS facilitate information exchange on model programs and effective control methods among the various state and local governments and with the academic community and professional organizations. This role in technology transfer would include developing information on performance standards for prevention practices and programs. "Sexually Transmitted

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Diseases: Treatment Guidelines, 1982" is a recent example of a source of technical information on prevention (*3*). Participants identified a need for additional information transmission on injury-control methods and behavioral research findings.

4. Professional development and training programs: All work groups expressed concern about the need to incorporate prevention methods and concepts, including the 1990 Objectives, into clinical training for medical and other health professionals and into public health school curricula. Training programs were proposed in several areas, particularly health promotion and occupational safety and health. Special courses to train health agency epidemiologists and industrial hygienists in current environmental and occupational health approaches were suggested. Similarly, the Health Promotion work group recommended developing a training program in planning, implementing, and evaluating health promotion programs for state and local health department personnel.

5. Building coalitions at the state and local level: Participants identified a key role for state and local health agencies in influencing public decision-makers to implement programs and policies that promote health. As part of the effort to establish coalitions supporting prevention programs, health agencies would be responsible for building relationships with schools of public health and medicine and prevention-oriented private organizations. Public health leaders could convene meetings addressing the 1990 Objectives and initiate collaboration projects that might result in innovative methods of preventing illness and improving health. To facilitate cooperative efforts between health agencies and private groups, health officers could review and recommend to foundations their findings regarding support for prevention projects. State and local health departments could also co-sponsor health promotion campaigns organized by volunteer associations, such as the American Cancer Society's Great American Smoke-Out.

6. Building coalitions at the national level: Work groups emphasized a leadership role for PHS in building relationships between official health agencies, professional associations, and academic institutions, including working with schools of public health and medical school preventive medicine departments to integrate the 1990 Objectives into their academic curricula; promoting the importance of health department activities among academic leaders; encouraging schools of public health and medicine to initiate joint studies with state and local health departments; and assisting these institutions to form coalitions at the state and local levels. Participants were interested in using professional and public coalitions to translate concern for promoting health into active and effective prevention programs and policies.

7. Dissemination of information to the public: One concern emphasized by all work groups was the need for public information about actions that individuals and organizations can take to prevent disease and promote health. Specifically, the participants recommended that CDC provide leadership in educating the public about disease detection and prevention methods and that state and local health departments, federal health agencies, professional organizations, and private organizations work with the media to transmit prevention messages to the public. Future seminars should include journalists as active participants to further public education on prevention issues.

These findings will be disseminated to seminar participants and to other public health professionals through the co-sponsoring organizations. Furthermore, CDC is working with the other PHS agencies to begin implementing many of the recommendations through current program activities. For example, the Health Resources and Services Administration and CDC

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are sponsoring workshops with schools of medicine and public health to identify ways of incorporating prevention methods into training programs for health professionals. The Office of Disease Prevention and Health Promotion (in the Office of the Assistant Secretary for Health), the National Center for Health Statistics, and CDC are identifying existing sources of data and the additional data needed to track progress toward the 1990 Objectives. PHS will also consider and analyze the seminar's recommendations during the program-planning process for fiscal year 1985 and beyond.

References

1. U.S. Public Health Service. Promoting health/preventing disease: objectives for the nation. Washington, D.C.: U.S. Public Health Service, 1980.
2. CDC. Model standards for community preventive health services. Atlanta, Georgia: Centers for Disease Control, 1979.
3. CDC. Sexually transmitted diseases: treatment guidelines, 1982. MMWR 1982;31(2 suppl):31S-62S.

Leading Work-Related Diseases and Injuries — United States

The National Institute for Occupational Safety and Health (NIOSH) has recently developed a suggested list of the 10 leading work-related diseases and injuries (Table 1). Three criteria were used to develop the list: the disease's or injury's frequency of occurrence, its severity in the individual case, and its amenability to prevention. The list is suggested with three purposes: 1) to encourage deliberation and debate among professionals about the major problems in this field of public health, 2) to assist in setting national priorities for efforts to prevent health problems related to work, and 3) to convey to a diverse audience the concerns of the leadership of NIOSH and the focus of the Institute's activities. The list is intended to be dynamic; it will be reviewed periodically for necessary updating as knowledge increases and as conditions change and are brought under better control.

The following article contains a detailed discussion of occupational lung disease, the problem top-ranked on the list; future articles will elaborate on the others.

OCCUPATIONAL LUNG DISEASES

The lung is both a target organ and a portal of entry for toxic substances. The likelihood of toxic exposure is high; for example, an estimated 1.2 million workers each year are potentially exposed to silica dust alone (*2*). The recognition of occupational lung diseases may be difficult, since the latent period for such diseases may be long—as long as 15 years for silicosis and 30 years or more for asbestos-related diseases. Other factors, such as cigarette smoking, may also contribute significantly to the disease process and hence obscure the association between work and the disease (*3*).

Six important components of occupational lung diseases are described below. Each is preventable, although years of effective control measures will be required to eliminate diseases of long latency. Because of the rapid rate at which new potentially toxic agents are introduced into the workplace, vigorous pre-market toxicologic testing of agents and effective

Work-Related Diseases and Injuries – Continued

disease surveillance are essential if epidemics of occupational lung diseases are to be avoided. The U.S. Public Health Service has established the following national objective for the prevention of occupational lung diseases: "by 1990, among workers newly exposed after 1985, there should be virtually no new cases of four preventable occupational diseases—asbestosis, byssinosis, silicosis, and coal workers' pneumoconiosis" (*4*). These diseases, as well as lung cancer and occupational asthma, are briefly discussed below.

Asbestosis: Asbestosis is characterized by diffuse, extensive scarring of the lung and progressive shortness of breath. Once established, the disease progresses even after exposure ends; there is no specific treatment. The latent period is 10-20 years. Smoking appears to increase the risk of death from asbestosis by a factor of two to three. Longitudinal studies of groups of asbestos insulation workers and shipyard workers have revealed that 10%-18% may be expected to die of asbestosis (*5*).

Byssinosis: This condition, characterized by both acute (reversible) and chronic lung disease, is associated with inhalation of the dusts of cotton, flax, or hemp. Symptoms include "chest tightness," cough, and obstruction of the small airways. Severely impaired lung function has disabled an estimated 35,000 current and retired textile workers (*6*). The specific causal agent(s) in the various dusts are yet to be identified (*7*).

Silicosis: Although the ill effects of exposure to free crystalline silica have been known for centuries, the prevalence of disabling silicosis remains high in certain groups of workers (*8*). Nearly 60,000 currently exposed workers in mines and foundries, in abrasive blasting operations, and in stone, clay, and glass manufacturing may be expected to suffer some degree of silicosis (*9*).

Coal workers' pneumoconiosis (CWP): The estimated prevalence of CWP among currently employed coal miners is about 4.5%. Approximately 0.2% of coal workers have been di-

TABLE 1. The ten leading work-related diseases and injuries – United States, 1982*

1. Occupational lung diseases: asbestosis, byssinosis, silicosis, coal workers' pneumoconiosis, lung cancer, occupational asthma
2. Musculoskeletal injuries: disorders of the back, trunk, upper extremity, neck, lower extremity; traumatically induced Raynaud's phemonenon
3. Occupational cancers (other than lung): leukemia; mesothelioma; cancers of the bladder, nose, and liver
4. Amputations, fractures, eye loss, lacerations, and traumatic deaths
5. Cardiovascular diseases: hypertension, coronary artery disease, acute myocardial infarction
6. Disorders of reproduction: infertility, spontaneous abortion, teratogenesis
7. Neurotoxic disorders: peripheral neuropathy, toxic encephalitis, psychoses, extreme personality changes (exposure-related)
8. Noise-induced loss of hearing
9. Dermatologic conditions: dermatoses, burns (scaldings), chemical burns, contusions (abrasions)
10. Psychologic disorders: neuroses, personality disorders, alcoholism, drug dependency

*The conditions listed under each category are to be viewed as *selected examples*, not comprehensive definitions of the category.

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agnosed as having progressive massive fibrosis, a potentially disabling form of CWP (*10*). In 1974, there were an estimated 19,400 cases of CWP. Some 4,000 deaths each year are attributed to legislatively defined "black lung disease" (*9*). Industrial bronchitis, another medical condition associated with exposure to coal dust, may lead to decreased ventilation capacity, but it is not well correlated with chest roentgenographic changes (*11*).

Lung cancer: The single most important cause of lung cancer is tobacco smoke (*12*). However, numerous occupational agents are associated with lung cancer, including arsenic, asbestos, chloroethers, chromates, ionizing radiation, nickel, and polynuclear aromatic hydrocarbon compounds (*13*). Tobacco smoke may interact synergistically with some of these agents (e.g., asbestos) to sharply increase the risk (*5*). Of special concern in this regard are workers currently or previously exposed to asbestos (estimated from 7.6 to 13.2 million) (*14, 15*); as many as 6,000 asbestos-related lung cancers may occur annually (*15*).

Occupational asthma: Hypersensitivity reactions to a wide variety of occupational organic and inorganic agents can cause asthma and hypersensitivity pneumonitis. The prevalence of occupational asthma varies from 10% to nearly 100% of workers in certain occupations (*16*). Many agents are incriminated as etiologic for occupational asthma, including grain dusts,

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TABLE I. Summary—cases specified notifiable diseases, United States

Disease	2nd Week Ending			Cumulative, Second Week Ending		
	January 15, 1983	January 16, 1982	Median 1978-1982	January 15, 1983	January 16, 1982	Median 1978-1982
Aseptic meningitis	89	82	65	161	159	114
Encephalitis: Primary (arthropod-borne & unspec.)	16	12	12	33	20	20
Post-infectious	1	-	1	1	1	1
Gonorrhea: Civilian	16,968	18,672	18,672	35,052	38,313	35,012
Military	621	630	496	963	1,054	1,054
Hepatitis: Type A	373	313	378	701	631	731
Type B	350	277	283	677	578	516
Non A, Non B	44	21	N	70	33	N
Unspecified	139	152	152	232	263	275
Legionellosis	10	6	N	20	8	N
Leprosy	1	-	1	9	1	2
Malaria	10	7	9	14	19	19
Measles: Total	-	6	61	4	16	80
Indigenous	-	N	N	3	N	N
Imported*	-	N	N	1	N	N
Meningococcal infections: Total	49	51	51	90	87	85
Civilian	49	51	51	88	87	85
Military	-	-	-	2	-	-
Mumps	41	91	231	97	133	328
Pertussis	15	10	15	23	21	23
Rubella (German measles)	12	35	46	27	51	68
Syphilis (Primary & Secondary): Civilian	686	582	564	1,294	1,160	899
Military	21	12	5	23	18	16
Toxic-shock syndrome	7	N	N	11	N	N
Tuberculosis	377	314	399	636	591	643
Tularemia	-	1	2	3	1	3
Typhoid fever	11	10	6	14	14	9
Typhus fever, tick-borne (RMSF)	-	2	1	1	9	2
Rabies, animal	73	78	77	158	151	140

TABLE II. Notifiable diseases of low frequency, United States

	Cum. 1983		Cum. 1983
Anthrax	-	Plague	-
Botulism: Foodborne	-	Poliomyelitis: Total	-
Infant (Calif. 1)	1	Paralytic	-
Other	-	Psittacosis (Upstate N.Y. 1, Calif. 1)	4
Brucellosis (Va. 1, Idaho 1)	2	Rabies, human	-
Cholera	-	Tetanus (Oreg. 1)	2
Congenital rubella syndrome (Calif. 1)	1	Trichinosis (Mass. 1)	1
Diphtheria	-	Typhus fever, flea-borne (endemic, murine)	-
Leptospirosis	-		

*For measles only, imported cases includes both out-of-state and foreign importations.

TABLE III. Cases of specified notifiable diseases, United States, weeks ending January 15, 1983 and January 16, 1982 (2nd week)

Reporting Area	Aseptic Meningitis	Encephalitis		Gonorrhea (Civilian)		Hepatitis (Viral), by type				Legionellosis	Leprosy	Malaria
		Primary	Post-infectious			A	B	NA,NB	Unspecified			
	1983	Cum. 1983	Cum. 1983	Cum. 1983	Cum. 1982	1983	1983	1983	1983	1983	Cum. 1983	Cum. 1983
UNITED STATES	89	33	1	35,052	38,313	373	350	44	139	10	9	14
NEW ENGLAND	5	2	-	842	779	7	9	1	13	-	-	-
Maine	-	-	-	56	50	-	-	-	-	-	-	-
N.H.	-	-	-	24	32	1	-	-	-	-	-	-
Vt.	-	-	-	18	23	-	-	-	-	-	-	-
Mass.	1	2	-	314	274	4	5	1	13	-	-	-
R.I.	4	-	-	50	49	2	4	-	-	-	-	-
Conn.	-	-	-	380	351	-	-	-	-	-	-	-
MID ATLANTIC	14	3	-	3,601	3,433	38	36	-	13	1	1	4
Upstate N.Y.	11	1	-	219	319	9	16	-	8	-	-	1
N.Y. City	3	2	-	1,644	1,931	19	8	-	-	1	1	3
N.J.	-	-	-	670	453	10	12	-	5	-	-	-
Pa.	-	-	-	1,068	730	-	-	-	-	-	-	-
E.N. CENTRAL	23	8	-	4,068	5,244	54	62	5	9	8	1	-
Ohio	14	4	-	1,286	1,840	20	23	-	4	7	1	-
Ind.	-	-	-	273	252	-	-	-	-	-	-	-
Ill.	-	-	-	526	1,282	-	4	-	-	1	-	-
Mich.	9	4	-	1,510	1,291	34	35	5	5	-	-	-
Wis.	-	-	-	473	579	-	-	-	-	-	-	-
W.N. CENTRAL	1	1	-	1,785	1,858	14	25	-	3	1	-	-
Minn.	-	-	-	304	348	5	-	-	-	-	-	-
Iowa	1	1	-	163	158	2	1	-	-	1	-	-
Mo.	-	-	-	811	822	6	24	-	3	-	-	-
N. Dak.	-	-	-	18	20	-	-	-	-	-	-	-
S. Dak.	-	-	-	38	53	-	-	-	-	-	-	-
Nebr.	-	-	-	128	95	1	-	-	-	-	-	-
Kans.	-	-	-	323	362	-	-	-	-	-	-	-
S. ATLANTIC	13	8	-	8,592	11,616	39	57	3	6	-	-	1
Del.	-	-	-	235	157	-	1	-	-	-	-	-
Md.	1	1	-	1,265	2,143	3	15	3	1	-	-	-
D.C.	U	-	-	265	432	U	U	U	U	U	-	-
Va.	1	4	-	678	705	2	5	-	1	-	-	1
W. Va.	-	-	-	93	101	2	-	-	-	-	-	-
N.C.	6	2	-	985	2,003	3	13	-	3	-	-	-
S.C.	1	1	-	1,029	893	9	7	-	-	-	-	-
Ga.	1	-	-	1,580	1,678	14	16	-	-	-	-	-
Fla.	3	-	-	2,462	3,504	6	-	-	1	-	-	-
E.S. CENTRAL	5	2	-	3,247	2,548	36	32	4	1	-	-	-
Ky.	3	-	-	431	332	30	4	1	1	-	-	-
Tenn.	-	-	-	1,063	1,022	3	17	-	-	-	-	-
Ala.	2	2	-	1,033	697	3	11	3	-	-	-	-
Miss.	-	-	-	720	497	-	-	-	-	-	-	-
W.S. CENTRAL	3	2	-	5,107	6,010	55	23	1	44	-	1	-
Ark.	-	-	-	456	600	-	-	-	1	-	-	-
La.	-	-	-	542	611	1	7	-	-	-	-	-
Okla.	1	1	-	600	639	1	2	1	-	-	-	-
Tex.	2	1	-	3,509	4,160	53	14	-	43	-	1	-
MOUNTAIN	4	1	-	1,010	1,310	27	12	2	5	-	-	-
Mont.	-	-	-	61	84	-	-	-	-	-	-	-
Idaho	-	-	-	42	46	3	-	-	1	-	-	-
Wyo.	-	-	-	55	44	-	-	-	-	-	-	-
Colo.	-	-	-	255	333	10	6	1	1	-	-	-
N. Mex.	-	-	-	131	128	3	-	-	1	-	-	-
Ariz.	-	-	-	256	407	-	-	-	-	-	-	-
Utah	2	1	-	40	49	5	2	1	1	-	-	-
Nev.	2	-	-	170	219	6	4	-	1	-	-	-
PACIFIC	21	6	1	6,800	5,515	103	94	28	45	-	6	9
Wash.	1	-	-	154	434	3	2	1	5	-	-	-
Oreg.	-	-	-	266	323	8	4	8	2	-	-	1
Calif.	19	5	1	6,143	4,472	86	87	19	38	-	6	8
Alaska	1	-	-	102	176	1	1	-	-	-	-	-
Hawaii	-	1	-	135	110	5	-	-	-	-	-	-
Guam	U	-	-	-	4	U	U	U	U	U	-	-
P.R.	1	-	-	-	96	2	2	-	1	-	-	-
V.I.	-	-	-	19	9	-	-	-	-	-	-	-
Pac. Trust Terr.	U	-	-	-	19	U	U	U	U	U	-	-

N: Not notifiable U: Unavailable

TABLE III. (Cont.'d). Cases of specified notifiable diseases, United States, weeks ending January 15, 1983 and January 16, 1982 (2nd week)

Reporting Area	Measles (Rubeola)					Menin-gococcal Infections	Mumps			Pertussis			Rubella		
	Indigenous		Imported		Total										
	1983	Cum. 1983	1983	Cum. 1983	Cum. 1982	Cum. 1983	1983	Cum. 1983	Cum. 1982	1983	Cum. 1983	Cum. 1982	1983	Cum. 1983	Cum. 1982
UNITED STATES	-	3	-	1	16	90	41	97	133	15	23	21	12	27	51
NEW ENGLAND	-	-	-	-	1	7	2	3	29	1	1	2	-	1	3
Maine	-	-	-	-	-	-	-	1	2	-	-	-	-	-	-
N.H.	-	-	-	-	-	1	2	2	1	-	-	-	-	-	3
Vt.	-	-	-	-	1	-	-	-	1	1	1	-	-	-	-
Mass.	-	-	-	-	-	1	-	-	25	-	-	1	-	1	-
R.I.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Conn.	-	-	-	-	-	5	-	-	-	-	-	1	-	-	-
MID ATLANTIC	-	-	-	-	3	8	1	4	7	4	5	1	-	-	1
Upstate N.Y.	-	-	-	-	2	4	-	2	3	3	3	1	-	-	1
N.Y. City	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-
N.J.	-	-	-	-	-	1	1	2	1	1	2	-	-	-	-
Pa.	-	-	-	-	1	3	-	-	2	-	-	-	-	-	-
E.N. CENTRAL	-	-	-	-	1	19	15	44	48	6	8	4	1	3	3
Ohio	-	-	-	-	-	11	4	20	24	6	8	-	-	1	-
Ind.	-	-	-	-	-	-	-	-	5	-	-	-	-	-	-
Ill.	-	-	-	-	-	1	2	2	2	-	-	-	-	-	-
Mich.	-	-	-	-	1	7	9	22	15	-	-	3	1	1	1
Wis.	-	-	-	-	-	-	-	-	2	-	-	1	-	1	2
W.N. CENTRAL	-	-	-	-	-	5	3	7	8	1	1	-	-	3	2
Minn.	-	-	-	-	-	-	-	1	-	-	-	-	-	2	1
Iowa	-	-	-	-	-	2	2	4	2	-	-	-	-	-	-
Mo.	-	-	-	-	-	3	-	-	2	1	1	-	-	-	-
N. Dak.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
S. Dak.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nebr.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Kans.	-	-	-	-	-	-	1	2	4	-	-	-	-	1	1
S. ATLANTIC	-	-	-	-	6	18	3	7	12	-	1	2	1	3	4
Del.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Md.	-	-	-	-	-	2	-	-	3	-	-	-	-	1	-
D.C.	U	-	U	-	-	-	U	-	-	U	-	-	U	-	-
Va.	-	-	-	-	6	1	-	3	1	-	-	-	-	-	4
W. Va.	-	-	-	-	-	-	3	3	7	-	-	1	1	1	-
N.C.	-	-	-	-	-	5	-	-	-	-	-	-	-	-	-
S.C.	-	-	-	-	-	3	-	-	1	-	-	1	-	-	-
Ga.	-	-	-	-	-	2	-	1	-	-	1	-	-	1	-
Fla.	-	-	-	-	-	5	-	-	-	-	-	-	-	-	-
E.S. CENTRAL	-	-	-	-	1	11	-	1	1	-	-	1	-	1	3
Ky.	-	-	-	-	-	4	-	-	1	-	-	-	-	1	3
Tenn.	-	-	-	-	1	3	-	1	-	-	-	1	-	-	-
Ala.	-	-	-	-	-	4	-	-	-	-	-	-	-	-	-
Miss.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
W.S. CENTRAL	-	-	-	-	-	5	11	14	3	3	4	-	2	2	5
Ark.	-	-	-	-	-	-	1	1	1	-	-	-	-	-	-
La.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Okla.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tex.	-	-	-	-	-	5	10	13	2	3	4	-	2	2	5
MOUNTAIN	-	-	-	-	-	1	1	1	3	-	2	3	2	2	2
Mont.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Idaho	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-
Wyo.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Colo.	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-
N. Mex.	-	-	-	-	-	-	-	-	-	-	2	2	-	-	-
Ariz.	-	-	-	-	-	-	-	-	1	-	-	1	-	-	-
Utah	-	-	-	-	-	-	1	1	1	-	-	-	2	2	1
Nev.	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PACIFIC	-	3	-	1	4	16	5	16	22	-	1	8	6	12	28
Wash.	-	-	-	-	-	6	1	3	8	-	-	-	-	-	1
Oreg.	-	-	-	-	-	2	-	-	-	-	-	2	-	-	-
Calif.	-	3	-	1	3	6	4	12	14	-	1	6	6	12	26
Alaska	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hawaii	-	-	-	-	1	2	-	1	-	-	-	-	-	-	1
Guam	U	-	U	-	-	-	U	-	1	U	-	-	U	-	-
P.R.	-	-	-	-	1	2	1	1	-	-	-	-	-	-	-
V.I.	2	2	1 §	1	-	-	-	-	-	-	-	-	1	1	-
Pac. Trust Terr.	U	-	U	-	-	-	U	-	-	U	-	-	U	-	-

U: Unavailable †International §Out-of-state

TABLE III. (Cont.'d). Cases of specified notifiable diseases, United States, weeks ending January 15, 1983 and January 16, 1982 (2nd week)

Reporting Area	Syphilis (Civilian) (Primary & Secondary)		Toxic-shock Syndrome	Tuberculosis		Tula-remia	Typhoid Fever	Typhus Fever (Tick-borne) (RMSF)	Rabies, Animal
	Cum. 1983	Cum. 1982	1983	1983	Cum. 1983	Cum. 1983	Cum. 1983	Cum. 1983	Cum. 1983
UNITED STATES	1,294	1,160	7	377	636	3	14	1	158
NEW ENGLAND	44	20	-	10	12	-	-	-	-
Maine	-	-	-	-	-	-	-	-	-
N.H.	-	-	-	-	-	-	-	-	-
Vt.	-	-	-	-	-	-	-	-	-
Mass.	26	13	-	3	3	-	-	-	-
R.I.	1	1	-	4	4	-	-	-	-
Conn.	17	6	-	3	5	-	-	-	-
MID ATLANTIC	141	171	1	86	122	-	2	-	6
Upstate N.Y.	8	13	1	24	30	-	2	-	6
N.Y. City	81	128	-	28	48	-	-	-	-
N.J.	26	13	-	14	24	-	-	-	-
Pa.	26	17	-	20	20	-	-	-	-
E.N. CENTRAL	46	50	4	75	100	-	2	-	8
Ohio	19	7	4	4	11	-	1	-	-
Ind.	9	2	-	11	11	-	-	-	-
Ill.	-	30	-	38	55	-	-	-	2
Mich.	10	7	-	18	18	-	1	-	-
Wis.	8	4	-	4	5	-	-	-	6
W.N. CENTRAL	14	28	-	11	15	2	-	-	18
Minn.	10	7	-	1	1	-	-	-	7
Iowa	1	-	-	-	4	-	-	-	6
Mo.	2	20	-	8	8	2	-	-	4
N. Dak.	-	1	-	-	-	-	-	-	-
S. Dak.	-	-	-	-	-	-	-	-	-
Nebr.	-	-	-	-	-	-	-	-	1
Kans.	1	-	-	2	2	-	-	-	-
S. ATLANTIC	315	321	-	70	179	-	2	-	68
Del.	1	2	-	-	-	-	-	-	-
Md.	16	19	-	26	42	-	-	-	37
D.C.	5	21	U	U	-	-	-	-	-
Va.	13	25	-	-	40	-	1	-	24
W. Va.	1	1	-	2	6	-	1	-	3
N.C.	32	24	-	1	1	-	-	-	-
S.C.	30	18	-	8	23	-	-	-	1
Ga.	65	68	-	9	19	-	-	-	2
Fla.	152	143	-	24	48	-	-	-	1
E.S. CENTRAL	86	71	-	39	62	-	-	1	13
Ky.	3	7	-	10	16	-	-	-	2
Tenn.	19	8	-	22	28	-	-	1	9
Ala.	46	28	-	7	18	-	-	-	2
Miss.	18	28	-	-	-	-	-	-	-
W.S. CENTRAL	342	329	-	21	28	-	-	-	17
Ark.	6	10	-	-	-	-	-	-	4
La.	74	33	-	2	2	-	-	-	-
Okla.	7	6	-	9	16	-	-	-	4
Tex.	255	280	-	10	10	-	-	-	9
MOUNTAIN	20	20	-	11	16	1	-	-	8
Mont.	2	-	-	1	3	-	-	-	7
Idaho	1	-	-	-	-	-	-	-	-
Wyo.	1	1	-	-	-	-	-	-	-
Colo.	3	10	-	-	-	-	-	-	-
N. Mex.	-	4	-	-	3	1	-	-	-
Ariz.	8	1	-	10	10	-	-	-	1
Utah	1	1	-	-	-	-	-	-	-
Nev.	4	3	-	-	-	-	-	-	-
PACIFIC	286	150	2	54	102	-	8	-	20
Wash.	-	4	-	1	3	-	-	-	-
Oreg.	2	4	-	3	5	-	-	-	-
Calif.	282	140	2	50	94	-	8	-	20
Alaska	-	-	-	-	-	-	-	-	-
Hawaii	2	2	-	-	-	-	-	-	-
Guam	-	-	U	U	-	-	-	-	-
P.R.	-	4	-	3	3	-	-	-	-
V.I.	-	-	-	-	-	-	-	-	-
Pac. Trust Terr.	-	-	U	U	-	-	-	-	-

U: Unavailable

TABLE IV. Deaths in 121 U.S. cities,* week ending January 15, 1983 (2nd week)

Reporting Area	All Causes, By Age (Years)						P&I** Total
	All Ages	≥65	45-64	25-44	1-24	<1	
NEW ENGLAND	670	473	136	29	14	18	50
Boston, Mass.	169	115	34	10	5	5	15
Bridgeport, Conn.	53	41	11	1	-	-	6
Cambridge, Mass.	27	17	7	3	-	-	5
Fall River, Mass.	25	21	2	2	-	-	-
Hartford, Conn.	53	34	15	2	1	1	1
Lowell, Mass.	30	23	6	-	1	-	2
Lynn, Mass.	18	14	3	1	-	-	-
New Bedford, Mass.	20	14	4	2	-	-	2
New Haven, Conn.	66	43	13	4	-	6	3
Providence, R.I.	77	57	13	1	3	3	4
Somerville, Mass.	13	9	4	-	-	-	-
Springfield, Mass.	39	27	7	2	2	1	4
Waterbury, Conn.	34	25	6	1	-	2	3
Worcester, Mass.	46	33	11	-	2	-	5
MID. ATLANTIC	2,771	1,787	617	210	81	76	118
Albany, N.Y.	46	28	13	1	1	3	2
Allentown, Pa.	19	15	3	1	-	-	-
Buffalo, N.Y.	110	65	34	6	1	4	7
Camden, N.J.	34	21	10	2	1	-	3
Elizabeth, N.J.	25	18	6	1	-	-	2
Erie, Pa.†	49	35	9	3	-	2	4
Jersey City, N.J.	48	35	6	3	-	4	1
N.Y. City, N.Y.	1,504	985	316	124	46	33	59
Newark, N.J.	48	22	12	9	3	2	2
Paterson, N.J.	19	9	8	2	-	-	-
Philadelphia, Pa.†	405	230	104	38	18	15	17
Pittsburgh, Pa.†	63	41	15	5	1	1	1
Reading, Pa.	29	26	3	-	-	-	1
Rochester, N.Y.	147	98	35	5	2	7	10
Schenectady, N.Y.	28	22	3	1	2	-	2
Scranton, Pa.†	19	13	4	1	1	-	1
Syracuse, N.Y.	86	60	17	3	2	4	1
Trenton, N.J.	35	23	5	3	3	1	1
Utica, N.Y.	22	15	7	-	-	-	4
Yonkers, N.Y.	35	26	7	2	-	-	-
E.N. CENTRAL	2,182	1,420	521	106	65	70	71
Akron, Ohio	71	46	20	3	-	2	-
Canton, Ohio	32	17	13	1	1	-	3
Chicago, Ill	322	200	80	20	10	12	7
Cincinnati, Ohio	87	58	22	4	3	-	7
Cleveland, Ohio	126	76	34	9	1	6	-
Columbus, Ohio	134	79	39	7	7	2	6
Dayton, Ohio	126	81	29	11	2	3	-
Detroit, Mich.	326	208	76	16	16	10	10
Evansville, Ind.	55	40	12	1	2	-	2
Fort Wayne, Ind.	63	43	14	1	-	5	2
Gary, Ind.	23	12	8	2	1	-	-
Grand Rapids, Mich.	90	71	12	1	1	5	4
Indianapolis, Ind.	176	102	53	7	8	6	6
Madison, Wis.	43	30	4	4	1	4	5
Milwaukee, Wis.	136	93	29	9	2	3	6
Peoria, Ill.	63	38	10	3	4	8	5
Rockford, Ill.	60	46	10	1	3	-	2
South Bend, Ind.	66	53	8	2	2	1	3
Toledo, Ohio	125	89	30	2	1	3	3
Youngstown, Ohio	58	38	18	2	-	-	-
W.N. CENTRAL	866	603	178	38	22	25	52
Des Moines, Iowa	79	54	17	5	2	1	6
Duluth, Minn.	31	18	12	1	-	-	2
Kansas City, Kans.	44	27	8	2	3	4	1
Kansas City, Mo.	105	71	23	5	4	2	9
Lincoln, Nebr.	19	19	-	-	-	-	1
Minneapolis, Minn.	143	106	19	6	5	7	8
Omaha, Nebr.	91	60	25	3	-	3	4
St. Louis, Mo.	177	119	42	7	3	6	7
St. Paul, Minn.	93	74	11	5	2	1	4
Wichita, Kans.	84	55	21	4	3	1	10
S. ATLANTIC	1,163	721	297	80	32	33	59
Atlanta, Ga.	160	104	38	11	3	4	2
Baltimore, Md.	220	123	64	20	8	5	4
Charlotte, N.C.	96	63	24	6	3	-	8
Jacksonville, Fla.	111	63	30	11	6	1	5
Miami, Fla.	94	56	25	8	2	3	2
Norfolk, Va.	61	39	15	2	2	3	10
Richmond, Va.	95	56	26	7	4	2	5
Savannah, Ga.	44	25	14	3	1	1	7
St. Petersburg, Fla.	83	62	11	4	1	5	3
Tampa, Fla.	77	55	14	2	1	5	7
Washington, D.C.	59	36	16	4	-	3	2
Wilmington, Del.	63	39	20	2	1	1	4
E.S. CENTRAL	903	563	237	50	32	21	45
Birmingham, Ala.	157	96	42	7	8	4	4
Chattanooga, Tenn.	75	51	19	2	1	2	9
Knoxville, Tenn.	56	45	9	2	-	-	1
Louisville, Ky.	125	77	34	5	4	5	6
Memphis, Tenn.	216	132	55	19	7	3	13
Mobile, Ala.	84	55	16	5	6	2	5
Montgomery, Ala.	48	25	16	4	2	1	3
Nashville, Tenn.	142	82	46	6	4	4	4
W.S. CENTRAL	1,533	925	351	133	62	62	62
Austin, Tex.	57	40	8	7	1	1	1
Baton Rouge, La.	76	50	17	3	2	4	6
Corpus Christi, Tex.	47	30	11	6	-	-	1
Dallas, Tex.	258	154	54	26	7	17	5
El Paso, Tex.	68	45	13	3	2	5	4
Fort Worth, Tex.	118	79	20	7	4	8	12
Houston, Tex.	294	154	78	37	19	6	5
Little Rock, Ark.	105	63	26	11	3	2	15
New Orleans, La.	141	88	29	14	7	3	-
San Antonio, Tex.	216	129	59	12	10	6	8
Shreveport, La.	51	28	12	2	2	7	-
Tulsa, Okla.	102	65	24	5	5	3	5
MOUNTAIN	713	462	155	48	19	29	33
Albuquerque, N.Mex.	67	40	13	9	2	3	4
Colo. Springs, Colo.	37	24	6	4	2	1	6
Denver, Colo.	166	103	46	10	4	3	3
Las Vegas, Nev.	61	38	15	6	1	1	3
Ogden, Utah	22	20	1	-	1	-	2
Phoenix, Ariz.	169	113	33	8	4	11	4
Pueblo, Colo.	21	12	6	3	-	-	1
Salt Lake City, Utah	56	34	12	3	1	6	3
Tucson, Ariz.	114	78	23	5	4	4	7
PACIFIC	2,013	1,354	413	131	55	60	137
Berkeley, Calif.	22	15	4	1	1	1	1
Fresno, Calif.	82	55	15	9	1	2	4
Glendale, Calif.	33	20	9	3	-	1	1
Honolulu, Hawaii	71	46	13	6	3	3	5
Long Beach, Calif.	97	62	24	4	1	6	2
Los Angeles, Calif.	495	313	114	37	19	12	17
Oakland, Calif.	55	37	9	4	3	2	1
Pasadena, Calif.	46	35	6	3	1	1	1
Portland, Oreg.	155	118	23	7	4	3	15
Sacramento, Calif.	72	51	16	3	1	1	3
San Diego, Calif.	191	123	46	14	4	4	19
San Francisco, Calif.	203	125	41	22	5	10	15
San Jose, Calif.	172	114	40	8	2	8	18
Seattle, Wash.	192	141	30	9	8	4	19
Spokane, Wash.	65	54	8	-	1	2	12
Tacoma, Wash.	62	45	15	1	1	-	4
TOTAL	12,814††	8,308	2,905	825	382	394	627

* 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 4 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.

TABLE V. Years of potential life lost, deaths, and death rates, cause of death, and estimated number of physician contacts, by principal diagnosis, United States

Cause of morbidity or mortality (Ninth Revision ICD, 1975)	Years of potential life lost before age 65 by persons dying in 1980[1]	Estimated mortality August 1982		Estimated number of physician contacts August 1982[4]
		Number[2]	Annual Rate/100,000[3]	
ALL CAUSES (TOTAL)	10,006,060	160,660	816.4	83,863,000
Accidents and adverse effects (E800-E807, E810-E825, E826-E949)	2,684,850	8,860	45.0	4,803,000
Malignant neoplasms (140-208)	1,804,120	37,880	192.5	1,443,000
Diseases of heart (390-398, 402, 404-429)	1,636,510	58,820	298.9	4,783,000
Suicides, homicides (E950-E978)	1,401,880	4,250	21.6	—
Chronic liver disease and cirrhosis (571)	301,070	2,050	10.4	101,000
Cerebrovascular diseases (430-438)	280,430	12,180	61.9	734,000
Pneumonia and influenza[5] (480-487)	124,830	3,440	17.5	726,000
Diabetes mellitus (250)	117,340	2,850	14.5	1,848,000
Chronic obstructive pulmonary diseases and allied conditions (490-496)	110,530	4,470	22.7	805,000
Prenatal care[6]				1,999,000
Infant mortality[6]		3,500	10.8 /1,000 live births	

[1]Years of potential life lost for persons between 1 year and 65 years old at the time of death are derived from the number of deaths in each age category as reported by the National Center for Health Statistics, *Monthly Vital Statistics Report* (MVSR), Vol. 29, No. 13, September 17, 1981, multiplied by the difference between 65 years and the age at the midpoint of each category. As a measure of mortality, "Years of potential life lost" underestimates the importance of diseases that contribute to death without being the underlying cause of death.

[2]The number of deaths is estimated by CDC by multiplying the estimated annual mortality rates (MVSR Vol. 31, No. 9, December 17, 1982, pp. 8-9) and the provisional U.S. population in that month (MVSR Vol. 31, No. 8, November 15, 1982, p.1) and dividing by the days in the month as a proportion of the days in the year.

[3]Annual mortality rates are estimated by NCHS (MVSR Vol. 31, No. 9, December 17, 1982, pp. 8-9), using the underlying cause of death from a systematic sample of 10% of death certificates received in state vital statistics offices during the month and the provisional population of those states included in the sample for that month.

[4]IMS America *National Disease and Therapeutic Index* (NDTI), Monthly Report, August 1982, Section III. This estimate comprises the number of office, hospital, and nursing home visits and telephone calls prompted by each medical condition based on a stratified random sample of office-based physicians (2,100) who record all private patient contacts for 2 consecutive days each quarter.

[5]Data for "infectious diseases and their sequelae" as a cause of death and physician visits comparable to other multiple-code categories (e.g., "malignant neoplasms") are not presently available.

[6]"Prenatal care" (NDTI) and "Infant mortality" (MVSR Vol. 31, No. 8, November 15, 1982, p.1) are included in the table because "Years of potential life lost" does not reflect deaths of children <1 year.

Work-Related Diseases and Injuries — Continued

flour, metals, inorganic chemicals, isocyanates, enzymes, and fungi. The list of agents associated with hypersensitivity pneumonitis is also long. If exposure continues, these conditions may result in progressive, irreversible pulmonary fibrosis.

Reported by Div of Surveillance, Hazard Evaluation, and Field Studies, Office of Director, NIOSH, CDC.

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Epidemiologic Notes and Reports

Impact of Influenza on a Nursing Home Population — New York

During December 1982, 49 (60.5%) of 81 residents at a skilled-nursing facility in upstate New York experienced influenza-like illness (*1*) with elevated temperature (≥ 37.8 C [100.0 F] oral or ≥ 38 C [100.4 F] rectal) and at least one of the following symptoms: cough, congestion, or sore throat. Six of the clinically diagnosed cases occurred sporadically before December 18, when the main cluster began, and the outbreak peaked on December 21

Influenza — Continued

(Figure 1). Influenza type A(H3N2) virus was grown from three of six respiratory specimens cultured from ill residents on December 24. Six residents were hospitalized following influenza-like illnesses. Three of those, as well as one non-hospitalized resident with influenza-like illness, died, for a case-fatality ratio of 8.2%. Sixty-five (80.2%) of the 81 residents were female, and 38 (58.5%) of those were ill. The mean age for all patients was 86.4 years.

All residents except one were more than 65 years old, and 78 (96.3%) had at least one pre-existing medical condition for which influenza vaccine is strongly recommended (*2*). Influenza vaccine had been offered to all residents in October 1982, and permission to give it was received for 54 (66.7%), all of whom were vaccinated. Using the case definition above, the clinical attack rate for the vaccinated residents was 48.1%, and for the 27 unvaccinated residents, 85.2%, resulting in a calculated rate of vaccine efficacy in preventing clinical influenza illness of 43.5%.

During December, the number of visits for acute respiratory disease (ARD) at the emergency room (ER) of an adjacent hospital increased to 171 (31% of total visits) from 64 (14.5% of total visits) in November; during the week ending December 12, 33% of ER visits were for ARD, compared with 20% or less during each of the preceding 2 weeks, and 10%-15% in early and mid-November.

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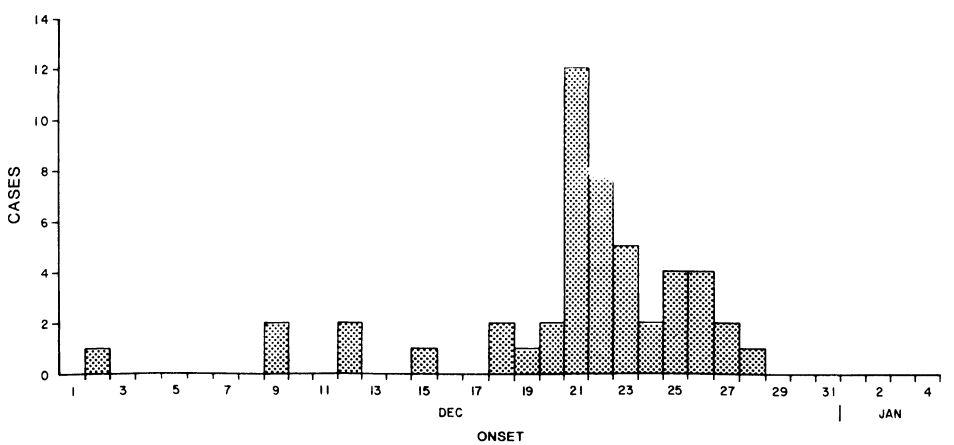
Editorial Note: This outbreak is unusual for its high attack rate of influenza-like illness, which ranged from 48% in vaccinated residents to 85% in non-vaccinated residents. Although the overall estimated attack rates are based only on clinical illness, without supportive diagnostic results for most patients, the probability that the outbreak was largely associated with influenza viruses is supported by the finding that the impact of the outbreak was apparently lessened by vaccine use in more than half the residents. To reduce the impact of influenza on nursing home residents, it appears desirable that, except where specifically contraindicated

FIGURE 1. Number of nursing home residents with influenza-like illness, by date of onset — New York, December 1, 1982-January 4, 1983



Influenza — Continued

(e.g., persons with egg allergy), consent for vaccination be given by all residents or relatives responsible for them, and that communications from hospitals or physicians about increased influenza activity be rapidly made available to those in the locality responsible for infection control measures in nursing homes.

References

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Illness Associated with Exposure to Naphthalene in Mothballs — Indiana

In April 1982, the Clark County Health Department in Jeffersonville, Indiana, received a telephone call from a 26-year-old woman whose friends were becoming ill with symptoms of headache, nausea, and vomiting while visiting her apartment.

An investigation of the home by the health department identified large numbers of mothballs (approximately 300-500) distributed throughout the apartment in such places as the kitchen and living room. The woman said members of her family had used mothballs for many years to curb odors and to control insects. Air samples collected in the apartment on charcoal and analyzed by gas chromatography and flame ionization revealed detectable levels of naphthalene (20 parts per billion).

The woman, her 4-year-old daughter, and seven relatives living in two other households where mothballs were extensively used, had symptoms and medical findings compatible with naphthalene exposure—headache, nausea, vomiting, abdominal pain, malaise, confusion, anemia, icterus, and renal disease. Headache, nausea, vomiting, abdominal cramps, and malaise disappeared in members of all three households when mothball use was discontinued, and visitors no longer developed symptoms when visiting the woman's apartment.

Reported by M Linick, Clark County Health Dept, Jeffersonville, Indiana; Special Studies Br, Div of Chronic Diseases, Center for Environmental Health, CDC.

Editorial Note: The use of mothballs in homes to control odors and insects is common in some areas of the country, although the quantity of mothballs used in this situation appears uncommon. The major component of mothballs is naphthalene. Inhalation of naphthalene may cause skin and eye irritation; gastrointestinal symptoms, such as nausea, vomiting, abdominal cramps, and diarrhea; neurologic symptoms, such as confusion, excitement, and convulsions; renal problems, such as acute renal shutdown; and hematologic features, such as icterus and severe anemia. The erythrocytes of individuals with glucose-6-phosphate dehydrogenase deficiency are more susceptible to hemolysis by naphthalene (*1-3*).

Although naphthalene levels were relatively low when measurements were taken in the home, levels may have been much higher—because of increased volatilization of naphthalene—when fresh supplies of mothballs were first introduced. Individuals vary widely in susceptibility to naphthalene exposure, and among sensitive individuals, minute doses have induced symptomatic reactions (*3*). Although adequate air monitoring to fully characterize

Naphthalene in Mothballs — Continued

exposure was not available, it seems possible that such excessive use of mothballs could lead to symptomatic reactions. Because of the wide range of sensitivity to naphthalene, the excessive and inappropriate use of mothballs for odor and insect control is inadvisable.

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2. Sittig M. Handbook of toxic and hazardous chemicals. Park Ridge, New Jersey: Noyes, 1981.
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The editor welcomes accounts of interesting cases, outbreaks, environmental hazards, or other public health problems of current interest to health officials. Such reports and any other matters pertaining to editorial or other textual considerations should be addressed to: ATTN: Editor, *Morbidity and Mortality Weekly Report,* Centers for Disease Control, Atlanta, Georgia 30333.

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